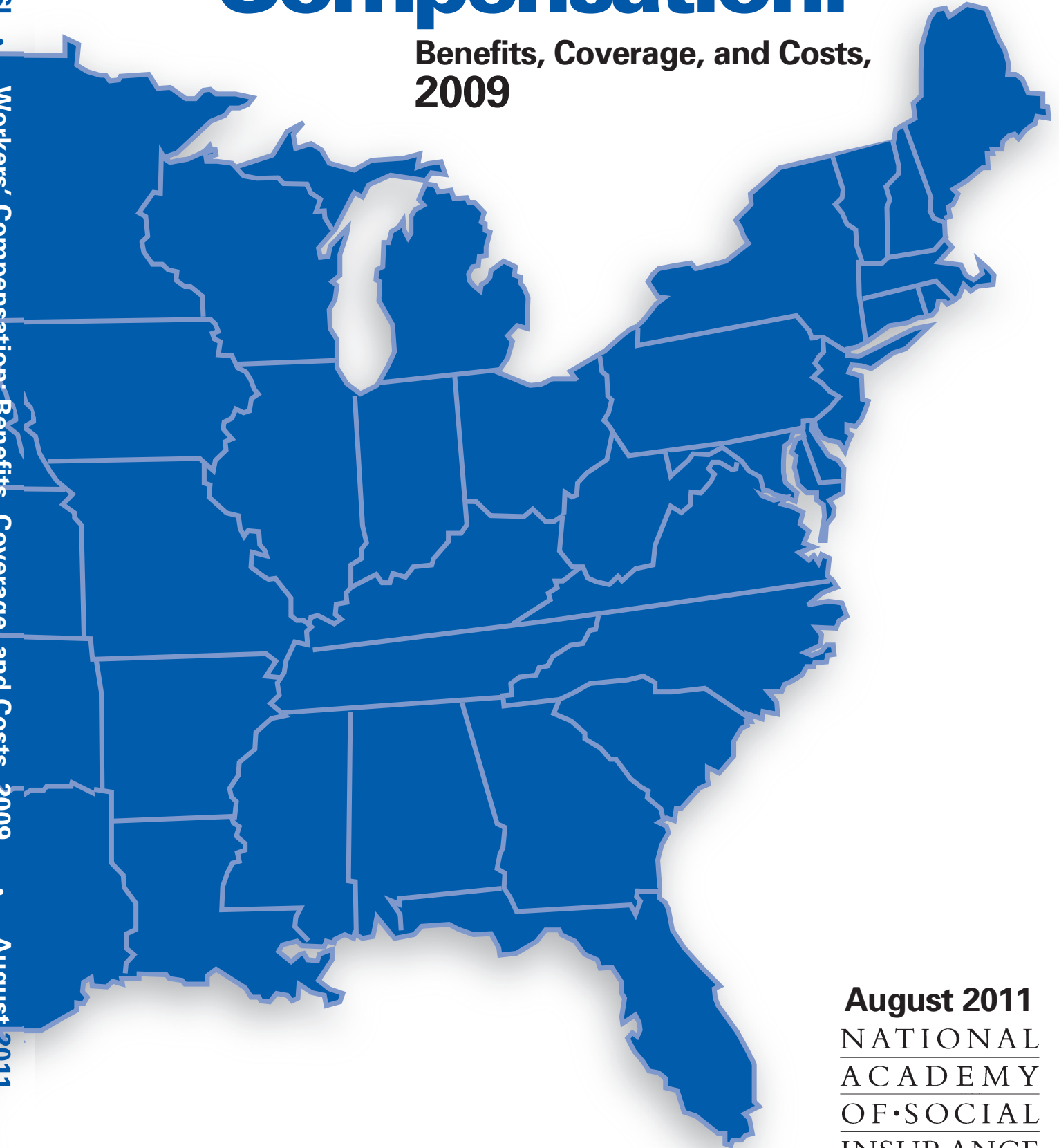


# Workers' Compensation:

Benefits, Coverage, and Costs,  
2009

NAS  
Workers' Compensation Benefits Coverage and Costs 2009  
August 2011



**August 2011**  
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The National Academy of Social Insurance is a nonprofit, nonpartisan organization made up of the nation’s leading experts on social insurance. Its mission is to promote understanding of how social insurance contributes to economic security and a vibrant economy. Social insurance encompasses broad-based systems for insuring workers and their families against economic insecurity caused by loss of income from work and the cost of health care. NASI’s scope covers social insurance, such as Social Security, Medicare, workers’ compensation, and unemployment insurance, related public assistance, and private employee benefits. The Academy convenes study panels that are charged with conducting research, issuing findings, and, in some cases, reaching recommendations based on their analysis. Members of these groups are selected for their recognized expertise and with due consideration for the balance of disciplines and perspectives appropriate to the project.

This research report presents new data and does not make recommendations. It was prepared with the guidance of the Study Panel on National Data on Workers’ Compensation. In accordance with procedures of the Academy, it has been reviewed by a committee of the Board for completeness, accuracy, clarity, and objectivity. This project received financial support from the Social Security Administration, the Centers for Medicare & Medicaid Services, and the Office of Workers’ Compensation Programs of the U.S. Department of Labor. It also received in-kind support in data from the National Council of Compensation Insurance and the National Association of Insurance Commissioners.

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ISBN: 1-884902-57-X

# **Workers' Compensation:**

**Benefits, Coverage, and Costs,  
2009**

*by*

**Ishita Sengupta, Virginia Reno, and John F. Burton, Jr.**

*with advice of the*

**Study Panel on Workers' Compensation Data**

**August 2011**

**NATIONAL  
ACADEMY  
OF SOCIAL  
INSURANCE  
Washington, DC**



# Preface

This is the fourteenth report the Academy has issued on workers' compensation national data. Before the National Academy of Social Insurance began the publication, the U.S. Social Security Administration (SSA) produced the only comprehensive national data on workers' compensation benefits and costs with annual estimates dating back to 1946. SSA discontinued the series in 1995 after publishing data for 1992–93. In February 1997, the Academy received start-up funding from The Robert Wood Johnson Foundation to launch a research initiative in workers' compensation with its first task to develop methods to continue the national data series. In December 1997, it published a report that extended the data series through 1995. Today funding for the project comes from the Social Security Administration, the Centers for Medicare & Medicaid Services, and the U.S. Department of Labor. In addition, the National Council on Compensation Insurance and the National Association of Insurance Commissioners provide access to important data for the project. Without support from these sources, continuing this vital data series would not be possible. This is the seventh edition of the report co-authored by Ishita Sengupta, Virginia Reno, and me. Ishita warrants her name being listed first in recognition of the amounts of time and energy she devoted to the publication.

This report also benefited from the expertise of members of the Study Panel on Workers' Compensation Data, who gave generously of their time and knowledge in advising on data sources and

presentation, interpreting results, and reviewing the draft report. The panel is listed on page ii. We would like to especially acknowledge Barry Llewellyn, National Council on Compensation Insurance; Eric Nordman, National Association of Insurance Commissioners and Alex Swedlow, California Workers' Compensation Institute, all of whom provided the Academy with data and their considerable expertise on many data issues. We are especially thankful to Marjorie Baldwin of Arizona State University and Kate Kimpan of Dade Moeller & Associates, for their efforts in reorganizing the report. We are also grateful for the useful comments provided by Allan Hunt, W.E. Upjohn Institute; Keith Bateman, Property and Casualty Insurers Association of America; Les Boden, Boston University; Doug Holmes, UWC; Greg Krohm, International Association of Industrial Accident Boards and Commissions; Mike Manley, Oregon Department of Consumer and Business Services; Frank Neuhauser, University of California, Berkeley; and William Wiatrowski, BLS. This year, we welcome Gary Steinberg, Acting Director, OWCP, DoL to our Data Panel. We are also thankful to NASI member Mark Priven, Bickmore Risk Services, for his help with the data. Finally, this report benefited from helpful comments during Board review by Rene Parent, Hank Patterson, and Glenn Shor.

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# Table of Contents

Preface.....	i
Highlights.....	1
National Trends.....	1
State Trends.....	1
Background.....	1
Need for this Report.....	1
Target Audience.....	2
Workers' Compensation and Other Disability Benefits.....	2
Overview of Workers' Compensation.....	4
History of Workers' Compensation.....	4
Financing and Coverage.....	4
Workers' Compensation Benefits and Costs.....	5
Covered Employment and Wages.....	7
Methods for Estimating Coverage.....	7
State and National Trends in Coverage.....	9
Workers' Compensation Benefits.....	9
Types of Benefits.....	9
Methods for Estimating Benefits Paid.....	13
National Trends in Cash and Medical Benefits.....	16
National Trends in Benefits by Insurance Provider.....	16
National Trends in Deductibles and Self Insurance.....	18
State Trends in Benefits.....	20
State Benefits by Insurance Providers.....	21
State Trends in Medical Benefits.....	21
State Trends in Benefits Relative to Wages.....	30
Employer Costs.....	31
Alternative Measures of Employers' Costs.....	32
Trends in Benefits and Employer Costs.....	32
Work Injuries, Occupational Illness and Fatalities.....	37
Fatalities at Work.....	37
Nonfatal Injuries and Illnesses.....	37
Insured Workers' Compensation Claims.....	39
Reports of Injuries and Workers' Compensation Claims.....	40
Comparing Workers' Compensation with Other Disability Benefit Programs.....	42
Other Disability Benefits.....	42
Social Security Disability Insurance and Medicare.....	43
Coordination between Workers' Compensation and Social Security Disability Insurance Benefits.....	43
Trends in Social Security Disability Benefits and Workers' Compensation.....	45
Incurred Benefits Compared with Paid Benefits.....	46
Glossary.....	49

General Terms for Workers' Compensation and Related Programs . . . . .	49
Terms for Workers' Compensation Insurance . . . . .	51
Appendix A: Coverage Estimates . . . . .	53
Appendix B: 2009 Survey Questionnaire . . . . .	57
Appendix C: Data Availability . . . . .	59
Appendix D: Revised Data for 2005–2008 . . . . .	63
Appendix E: Self-Insurer Benefits Estimates . . . . .	74
Appendix F: Medical Benefit Estimates . . . . .	76
Appendix G: Deductible Benefit Estimates . . . . .	77
Appendix H: Federal Programs . . . . .	78
Appendix I: Workers' Compensation under State Laws . . . . .	85
Appendix J: Second Injury Funds and Guaranty Funds . . . . .	95
References . . . . .	99

## Tables

Table 1	Workers' Compensation Benefits, Coverage, and Costs, 2008–2009: Summary . . . . .	3
Table 2	Number of Workers Covered under Workers' Compensation Programs and Total Covered Wages, 1989–2009 . . . . .	6
Table 3	Number of Workers Covered by Workers' Compensation and Total Covered Wages, By State, 2005–2009 . . . . .	10
Table 4	Workers' Compensation Benefits, by Type of Insurer and Share of Medical Benefits, 1960–2009 (in millions) . . . . .	14
Table 5	Estimated Employer-Paid Benefits under Deductible Provisions for Workers' Compensation, 1992–2009, (in millions) . . . . .	18
Table 6	Total Amount and Percentage Distribution of Workers' Compensation Benefit Payments by Type of Insurer, 1990–2009 . . . . .	19
Table 7	Workers' Compensation Benefits by State (in thousands) and Annual Percent Change, 2005–2009 . . . . .	22
Table 8	Workers' Compensation Benefits by Type of Insurer and Medical Benefits, by State, 2009 (in thousands) . . . . .	24
Table 9	Medical, Cash, and Total Benefits, by State, 2008–2009 (in thousands) . . . . .	26
Table 10	Workers' Compensation Benefits Per \$100 of Covered Wages, by State, 2005–2009 . . . . .	28
Table 11	Employer Costs for Workers' Compensation by Type of Insurer, 1987–2009 (in millions) . . . . .	33
Table 12	Workers' Compensation Benefit and Cost Ratios, 1980–2009 . . . . .	34
Table 13	Workers' Compensation Cost Per \$100 of Payroll: Comparison of NASI and BLS Estimates, 1980–2009 . . . . .	35
Table 14	Number of Fatal Occupational Injuries, 1992–2009 . . . . .	37



Table 15	Private Industry Occupational Injuries and Illnesses: Total Non-fatal Cases and Incidence Rates, 1987–2009	.38
Table 16	Number of Workers’ Compensation Claims per 100,000 Insured Workers: Private Carriers in Forty-One Jurisdictions, 1992-2006	.40
Table 17	Social Security Disability Insurance (DI) Beneficiaries with Workers’ Compensation (WC) or Public Disability Benefit (PDB) Number and Percentage of beneficiaries, by type of compensation and DI offset status, December 2010	.44
Table 18	Comparison of Accident-Year Incurred Benefits with Calendar-Year Benefits Paid by Private Carriers and State Funds in Thirty-seven States, 1998–2009	.47
Table A1	Documenting Workers’ Compensation Coverage Estimates, 2009 Annual Averages	.54
Table B	Annual Data Survey	.57
Table C1	Data Sources for 2009	.61
Table D1	Workers’ Compensation Benefits by Type of Insurer and Medical Benefits, by State, 2008 (in thousands)	.64
Table D2	Workers’ Compensation Benefits by Type of Insurer and Medical Benefits, by State, 2007 (in thousands)	.66
Table D3	Workers’ Compensation Benefits by Type of Insurer and Medical Benefits, by State, 2006 (in thousands)	.68
Table D4	Workers’ Compensation Benefits by Type of Insurer and Medical Benefits, by State, 2005 (in thousands)	.70
Table D5	Corrected Version of Table 9.B1 of the Annual Statistical Supplement to the Social Security Bulletin: Coverage, Benefits, and Costs, selected years 1980–2009	.72
Table E1	Self-Insurer Estimation Results, 2005–2009	.75
Table H1	Federal Employees’ Compensation Act, Benefits and Costs, 1997–2009 (in thousands)	.79
Table H2	Longshore and Harbor Workers’ Compensation Act, Benefits, Costs and Number of DBA Death Claims, 1997–2009 (in thousands)	.80
Table H3	Black Lung Benefits Act, Benefits and Costs, 1997–2009 (in thousands)	.82
Table H4	Energy Employees Occupational Illness Compensation Program Act, Part B and Part E Benefits and Costs, 2001-2009 (in thousands)	.83
Table H5	Radiation Exposure Compensation Act, Benefits Paid as of May 12, 2011 (benefits in thousands)	.84
Table H6	Federal Veterans’ Compensation Program, Compensation Paid in Fiscal Year 2009 (benefits in thousands)	.84
Table I	Worker’s Compensation State Laws as of January 2010	.86
Table J1	Second Injury Fund Paid Benefits for the Calendar Years 2005-2009	.96
Table J2	Guaranty Funds Paid Benefits for the Calendar Years 2005-2009	.97
Table J3	Self-Insured Guaranty Funds Paid Benefits for the Calendar Years 2005-2009	.98

## Figures

Figure 1	Workers' Compensation Benefits and Costs Per \$100 of Covered Wages, 1980–2009 . . . . .	.7
Figure 2	Workers' Compensation Medical and Cash Benefits per \$100 of Covered Wages, 1980–2009 . . . . .	.8
Figure 3	Types of Disabilities in Workers' Compensation Cases with Cash Benefits, 2006: Percent of Cases . . . . .	.12
Figure 4	Share of Medical and Cash Benefits, 1960–2009 . . . . .	.17
Figure 5	Workers' Compensation Costs per \$100 of Payroll 1980–2009: Comparison of NASI and BLS Estimates . . . . .	.36
Figure 6	Private Industry Occupational Injuries and Illnesses: Incidence Rates 1987–2009 . . . . .	.39
Figure 7	Social Security Disability Insurance and Workers' Compensation Cash Benefits per \$100 of Wages, 1980–2009 . . . . .	.45

## Highlights

This report provides a benchmark of the coverage, benefits, and costs of workers' compensation in 2009, to facilitate policymaking and comparisons with other social insurance and employee benefit programs. The report has been produced annually by the National Academy of Social Insurance since 1998. Key estimates from this year's report are summarized below.

## National Trends

- Workers' compensation programs in the fifty states, the District of Columbia, and federal programs paid \$58.3 billion in benefits in 2009, an increase of 0.4 percent from \$58.1 billion in 2008 (Table 1).
- Medical payments decreased by 1.1 percent, to \$28.9 billion, in 2009 but cash benefits to injured workers increased by 1.9 percent to \$29.4 billion.
- Costs to employers fell by 7.6 percent in 2009 to \$73.9 billion. This is the largest percentage decline in employer costs since 1987.
- Workers' compensation covered an estimated 124.9 million workers in 2009, a decrease of 4.4 percent from the previous year due to the recession, which began in 2007. Aggregate wages of covered workers fell by 4.7 percent in 2009.
- Measured as a percentage of the wages of covered workers, benefits paid to workers increased whereas employer costs fell in 2009. As a share of covered wages, employers' costs in 2009 were lower than in any year since 1980 (Figure 1).
- A total of 4,551 fatal work injuries occurred in 2009, which is a 12.7 percent decrease from the number reported in 2008, and the lowest since 1992 (Table 14).

## State Trends

- Between 2008 and 2009, the total amount of benefits paid to injured workers declined in 27 jurisdictions while the remaining 24 jurisdictions experienced an increase in benefit payments (Table 7).
- Among the 51 jurisdictions (including the District of Columbia), on average from 2008 to 2009, medical benefits declined in 27 states and cash benefits increased in 28 states (Table 9).

## Background

*"Each state regulates its own workers' compensation program, with no standard reporting requirements"*

## Need for this Report

Workers' compensation provides medical care, rehabilitation, and cash benefits for workers who are injured on the job or who contract work-related illnesses. It also pays benefits to families of workers who die of work-related causes. Each state regulates its own workers' compensation program, with no standard reporting requirements to any federal agency.

The lack of uniform reporting of states' experiences with workers' compensation makes it necessary to piece together data from various sources to develop estimates of benefits paid, costs to employers, and the number of workers covered by workers' compensation. Unlike other U.S. social insurance programs, state workers' compensation programs are not federally financed or administered. And, unlike private pensions or employer-sponsored health benefits that receive favorable federal tax treatment, no federal laws set standards for "tax-qualified" plans or require comprehensive reporting of workers' compensation coverage and benefits.<sup>1</sup> The general lack of federally-

1 A reporting requirement enacted in 2007, Section 111 of S.2499 (now Public Law No. 110-173), requires workers' compensation claims administrators to report to the CMS (Centers for Medicare and Medicaid Services) information about workers' compensation recipients who are entitled to Medicare.

mandated data means that states vary greatly in the data they have available to assess the performance of workers' compensation programs.

For more than forty years, the research office of the U.S. Social Security Administration produced national and state estimates of workers' compensation benefits, but that activity ended in 1995. In response to requests from stakeholders and scholars in the workers' compensation field, the National Academy of Social Insurance took on the challenge of continuing that data series. This is the Academy's fourteenth annual report on workers' compensation benefits, coverage, and costs. This report presents new data on developments in workers' compensation in 2009 and updates estimates of benefits, costs, and coverage for the years 2005–2008. The revised estimates in this report replace estimates in the Academy's prior reports.

## Target Audience

The audience for the Academy's reports on workers' compensation includes journalists, business and labor leaders, insurers, employee benefit specialists, federal and state policymakers, and researchers in universities, government, and private consulting firms. The data are published in the *Statistical Abstract of the United States* by the U.S. Census Bureau, *Injury Facts* by the National Safety Council, *Employee Benefit News*, which tracks developments for human resource professionals, and *Fundamentals of Employee Benefit Programs* from the Employee Benefit Research Institute. The U.S. Social Security Administration publishes the data in its *Annual Statistical Supplement to the Social Security Bulletin*. The federal Centers for Medicare and Medicaid Services use the data in their estimates and projections of health care spending in the United States. The National Institute for Occupational Safety and Health uses the data to track the cost of workplace injuries in the United States. In addition, the International Association of Industrial Accident Boards and Commissions (the organization of state and provincial agencies that administer workers' compensation in the United States and Canada) uses the information to track and compare the performance of workers' compensation programs in the United States with similar systems in Canada.

The report is produced with the oversight of the members of the Academy's Study Panel on Workers'

*“Workers’ Compensation, as a source of support for disabled workers, is surpassed in size only by Social Security Disability Insurance and Medicare.”*

Compensation Data, who are listed on page ii of this report. The Academy and its expert advisors are continually seeking ways to improve the report and to adapt estimation methods to track new developments in the insurance industry and in workers' compensation programs.

## Workers' Compensation and Other Disability Benefits

Workers' compensation is an important part of American social insurance. As a source of support for disabled workers, it is surpassed in size only by Social Security Disability Insurance and Medicare. In 2009, Social Security paid \$118.3 billion in cash benefits to disabled workers and their dependents, while Medicare paid \$70.3 billion for health care for disabled persons under age 65 (SSA, 2010d; CMS, 2010). Workers' compensation programs in the fifty states, the District of Columbia, and federal programs paid \$58.3 billion in benefits in 2009. Of the total, \$28.9 billion was paid for medical care and \$29.4 billion for cash benefits (Table 1).

Workers' compensation differs from other disability insurance programs in important ways. Workers' compensation pays for medical care for work-related injuries beginning immediately after the injury occurs; it pays temporary disability benefits after a waiting period of three to seven days; it pays permanent partial and permanent total disability benefits to workers who have lasting consequences of disabilities caused on the job; in most states it pays rehabilitation and training benefits for those unable to return to pre-injury careers; and it pays benefits to survivors of workers who die of work-related causes. Social Security, in contrast, pays benefits to workers with long-term disabilities of any cause, but only when the disabilities preclude substantial paid employment. It also encourages return to work and continues to pay benefits even if there is some self-employment or “transitional work.” Social Security

**Table 1****Workers' Compensation Benefits\*, Coverage, and Costs\*\*, 2008–2009: Summary**

Aggregate Amounts	2008	2009	Change
Covered workers (in thousands)	130,643	124,856	-4.4
Covered wages (in billions)	\$5,954	\$5,675	-4.7
Workers' compensation benefits paid (in billions)	58.1	58.3	0.4
Medical benefits	29.3	28.9	-1.1
Cash benefits	28.8	29.4	1.9
Employer costs for workers' compensation (in billions)	79.9	73.9	-7.6
<b>Amount per \$100 of Covered Wages</b>			
Benefits paid	\$0.98	\$1.03	\$0.05
Medical payments	0.49	0.51	0.02
Cash payments to workers	0.48	0.52	0.04
Employer costs	1.34	1.30	-0.04

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

\*\* Costs are employer expenditures in the calendar year for workers' compensation benefits, administrative costs, and/or insurance premiums. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

Source: National Academy of Social Insurance estimates based on Tables 2, 8, 9, 11, 12 and D1.

also pays for survivor benefits to families of deceased workers and for rehabilitation services in some circumstances. Social Security Disability Insurance benefits begin no earlier than five months after the disability began; Medicare coverage begins twenty-nine months after the onset of medically verified inability to work. There are typically other state and local disability benefit programs for public employees and particularly for police and firefighters.

Paid sick leave, temporary disability benefits, and long-term disability insurance for non-work-related injuries or diseases are available to some workers

through employers or private insurance. About 61 percent of all private sector employees have some type of paid sick leave (U.S. DOL, 2010a). Sick leave typically pays 100 percent of wages for a few weeks. Private long-term disability insurance that is financed, at least in part, by employers covers about 33 percent of private sector employees and is usually paid after a waiting period of three to six months, or after short-term disability benefits end. Long-term disability insurance is generally designed to replace 60 percent of earnings and is reduced if the recipient receives workers' compensation or Social Security disability benefits.

# Overview of Workers' Compensation

*"Workers' compensation was the first form of social insurance in the United States."*

## History of Workers' Compensation

Germany enacted the first modern workers' compensation laws, known as Sickness and Accident Laws, in 1884, following their introduction by Chancellor Otto von Bismarck (Clayton, 2004). The next such laws were adopted in England in 1897. Workers' compensation was the first form of social insurance in the United States. The first workers' compensation law in the United States was enacted in 1908 to cover certain federal civilian workers. The first constitutional state laws were passed in 1911. The adoption of state workers' compensation programs has been called a significant event in the nation's economic, legal, and political history. The adoption of these laws in each state required great efforts by business and labor to reach agreements on the specifics of the benefits to be provided and on which industries and employers would have to provide these benefits. Today, each of the fifty states, the District of Columbia, and U.S. territories has its own program. A separate program covers federal civilian employees. Other federal programs provide benefits to coal miners with black lung disease, Longshore and Harbor workers, employees of overseas contractors with the U.S. government, certain energy employees exposed to hazardous material, workers engaged in the manufacturing of atomic bombs, and veterans injured while on active duty in the armed forces.

Before workers' compensation laws were enacted, an injured worker's only legal remedy for a work-related injury was to bring a tort suit against the employer and prove that the employer's negligence caused the injury. At the time, employers could use three common-law defenses to avoid compensating the worker:

assumption of risk (showing, for example, that the injury resulted from an ordinary hazard of employment)<sup>2</sup>; the fellow worker rule (showing that the injury was due to a fellow worker's negligence); and contributory negligence (showing that, regardless of any fault of the employer, the worker's own negligence contributed to the accident).

Under the tort system, workers often did not recover damages and experienced delays or high costs when they did. While employers generally prevailed in court, they nonetheless were at risk for substantial and unpredictable losses if the workers' suits were successful. Litigation created friction between employers and workers. Initial reforms took the form of employer liability acts, which eliminated some of the common-law defenses. Nonetheless, employees still had to prove negligence, which remained a significant obstacle to recovery (Burton and Mitchell, 2003).<sup>3</sup> Ultimately, both employers and employees favored workers' compensation legislation to ensure that a worker who sustained an occupational injury or disease arising out of and in the course of employment would receive predictable compensation without delay, regardless of who was at fault. As a quid pro quo, the employer's liability was limited. Under the exclusive remedy concept, the worker accepts workers' compensation as payment in full and gives up the right to sue. (There are limited exceptions to the exclusive remedy concept in some states, such as when there is an intentional injury of the employee). Workers' compensation benefits are not subject to federal or state income taxes.

*"Before workers' compensation laws were enacted, an injured worker's only legal remedy for a work-related injury was to bring a tort suit..."*

## Financing and Coverage

Workers' compensation programs vary across states in terms of who is allowed to provide insurance, which injuries or illnesses are compensable, and the

2 A more complete definition is provided by Willborn et. al (2007:851); "The assumption of risk doctrine barred recovery for the ordinary risks of employment; the extraordinary risks of employment, if the worker knew of them or might reasonably have been expected to know of them; and the risks arising from the carelessness, ignorance, or incompetency of fellow servants."

3 As a result, the employers' liability approach was abandoned in all jurisdictions and industries except the railroads, where it still exists.



level of benefits. Workers' compensation is financed almost exclusively by employers, although economists argue that workers pay for a substantial portion of the costs of the program in the form of lower wages (Leigh et al., 2000). Workers' compensation coverage is mandatory in all states but Texas.

Generally, state laws require employers who wish to self-insure for workers' compensation to obtain approval from the state regulatory authority after demonstrating financial ability to carry their own risk (self-insure). For those employers who purchase insurance, the premiums are based in part on their industry classifications and the occupational classifications of their workers. Many employers are also experience-rated, which results in higher (or lower) premiums for employers whose past experience – as evaluated by actuarial formulas that consider injury frequency and aggregate benefit payments – is worse (or better) than the experience of similar employers in the same insurance classification (Thomason, Schmidle, and Burton, 2001).

*“Workers’ compensation coverage is mandatory in all states but Texas.”*

Every state except Texas requires almost all private employers to provide workers' compensation coverage (IAIABC-WCRI, 2011). In Texas, coverage is voluntary, but employers not providing coverage are not protected from tort suits. An employee not covered by workers' compensation insurance or an approved self-insurance plan is allowed to file suit claiming the employer is liable for his or her work-related injury or illness in every state. Other states exempt some employers from mandatory coverage such as very small firms, certain agricultural employees, household employers, charitable or religious organizations, or some units of state and local government. Employers with fewer than three workers are exempt from mandatory workers' compensation coverage in Arkansas, Georgia, Michigan, New Mexico, North Carolina, Virginia, West Virginia, and Wisconsin<sup>4</sup>. Employers with fewer than four workers are exempt in Florida and South Carolina. Those with fewer than five employees are exempt in Alabama, Mississippi, Missouri, and

Tennessee. The rules for agricultural workers vary among states. In all except fourteen states, farm employers are exempt from mandatory workers' compensation coverage altogether. In other states, coverage is compulsory for some or all farm employers.

## **Workers' Compensation Benefits and Costs**

Total cash benefits to injured workers and medical payments for their health care were \$58.3 billion in 2009, a 0.4 percent increase from \$58.1 billion in 2008. Medical payments decreased by 1.1 percent to \$28.9 billion, and cash benefits to injured workers increased by 1.9 percent to \$29.4 billion, from the prior year (Table 1).

Costs to employers fell by 7.6 percent in 2009 to \$73.9 billion. This is the biggest percentage decline in employer costs since 1987. The decline in employer costs reflects the overall decline in employment in 2009. The number of workers covered by workers' compensation was 4.4 percent smaller in 2009 than in 2008 and was 5.2 percent smaller than the number covered in 2007. These employment declines are greater than any experience in the last two decades (Table 2). Moreover, the sluggish economy of 2009 saw even sharper declines in the construction industry, a sector that has above average workers' compensation costs due to higher frequency and severity of workplace injuries. Construction was the hardest hit industry with a decline of 19 percent in employment between 2008 and 2009 (Goodman and Mance, 2011; BLS 2011).

*“Costs to employers fell by 7.6 percent in 2009 to \$73.9 billion. This is the biggest percentage decline in employer costs since 1987...”*

Costs for self-insured employers are the benefits they pay plus an estimate of their administrative costs. For employers who buy insurance, costs are the premiums they pay in the year plus benefits and administrative costs they pay under deductible

4 An example of limited coverage of farm workers is Wisconsin, where employers, other than farmers, who usually have less than three employees but who have paid wages of \$500 or more in any calendar quarter for work performed within the state are covered the tenth day of the next calendar quarter.

arrangements in their insurance policies. From an insurance company's perspective, premiums received in a year are not expected to match up with benefits paid that year. Rather, the premiums are expected to cover all future liabilities for injuries that occur in the year. NASI measures of benefits and employer costs are designed to reflect the aggregate experience of two stakeholder groups – workers who rely on compensation for workplace injuries and employers who pay the bills. The NASI measures are not designed to assess the performance of the insurance industry or insurance markets. Other organizations analyze insurance trends.<sup>5</sup>

For long-term trends, it is useful to consider workers' compensation benefits and employer costs relative to aggregate wages of covered workers. In a steady state, one might expect benefits to keep pace with covered wages. This would be the case with no change in the frequency or severity of injuries and if wage replacement benefits for workers and medical payments to providers tracked the growth of wages in the economy generally. However, in reality, benefits and costs relative to wages vary significantly over time.

In 2009, aggregate wages of covered workers fell by 4.7 percent (Table 2). When measured relative to the wages of covered workers, workers' compensation

**Table 2**

**Number of Workers Covered under Workers' Compensation Programs and Total Covered Wages, 1989–2009**

Year	Total Workers		Total Wages	
	(in thousands)	Percent Change	(in billions)	Percent Change
1989	103,900		\$ 2,347	
1990	105,500	1.5	2,442	4.0
1991	103,700	-1.7	2,553	4.5
1992	104,300	0.6	2,700	5.7
1993	106,200	1.8	2,802	3.8
1994	109,400	3.0	2,949	5.2
1995	112,800	3.1	3,123	5.9
1996	114,773	1.7	3,337	6.9
1997	118,145	2.9	3,591	7.6
1998	121,485	2.8	3,885	8.2
1999	124,349	2.4	4,151	6.8
2000	127,141	2.2	4,495	8.3
2001	126,972	-0.1	4,604	2.4
2002	125,603	-1.1	4,615	0.2
2003	124,685	-0.7	4,717	2.2
2004	125,878	1.0	4,953	5.0
2005	128,158	1.8	5,213	5.3
2006	130,339	1.7	5,544	6.3
2007	131,734	1.1	5,857	5.6
2008	130,643	-0.8	5,954	1.7
2009	124,856	-4.4	5,675	-4.7

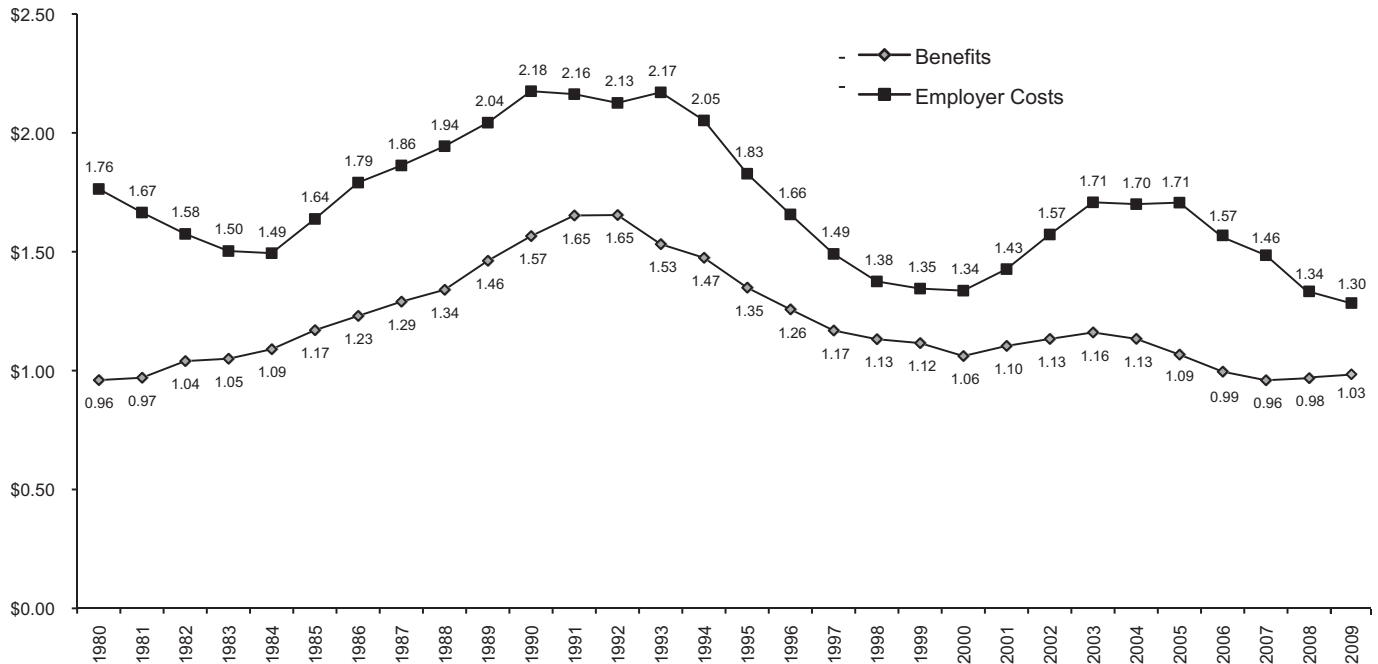
Source: National Academy of Social Insurance estimates. See Appendix A.

5 The National Council on Compensation Insurance (NCCI) and state rating bureaus, for example, assess insurance developments in the states and advise regulators and insurers on proposed system changes.



**Figure 1**

**Workers' Compensation Benefits\* and Costs\*\* Per \$100 of Covered Wages, 1980–2009**



Source: National Academy of Social Insurance estimates.

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

\*\* Costs are employer expenditures in the calendar year for workers' compensation benefits, administrative costs, and/or insurance premiums. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

benefits rose whereas employer costs fell in 2009 (Table 1). Total payments on workers' behalf rose by five cents to \$1.03 per \$100 of covered wages in 2009: medical payments rose by two cents to \$0.51 per \$100 of wages, while cash benefits rose by four cents per \$100 of wages to \$0.52. The cost to employers fell by four cents per \$100 of covered wages, to \$1.30 in 2009 from \$1.34 in 2008.

Figure 1 shows the trends in employer costs and in cash and medical benefits combined as a share of covered wages over the past 30 years. Benefits and costs declined sharply from their peaks in the early 1990s, reached a low in 2000, rebounded somewhat after 2000, and then declined in the last few years. As a share of covered wages, employer's costs in 2009 were lower than in any year since 1980. As a share of covered wages, benefits in 2009 were higher than they were in 2008 at \$1.03 per \$100 of wages (discussed in detail later in the report).

Figure 2 shows the trend in medical and cash payments separately. In 2009, cash benefits at \$0.52 per \$100 of wages were higher than \$0.48 in 2008, which was their lowest point since 1980 when the data in Figure 2 begin. Medical benefits, increased by two cents to \$0.51 per \$100 of wages in 2009, were much higher than at their lowest point since 1980, which was \$0.28 per \$100 of wages.

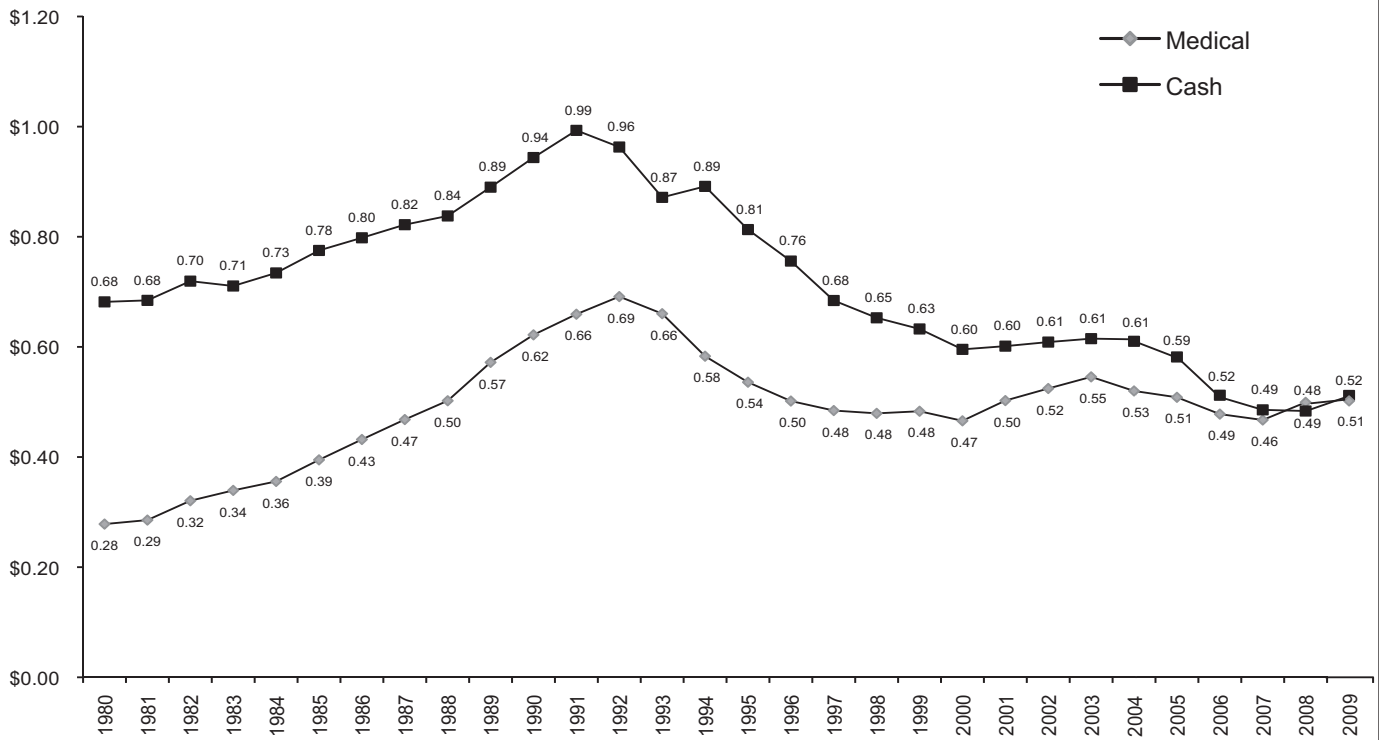
## Covered Employment and Wages

### Methods for Estimating Coverage

Because no national system exists for counting workers covered by workers' compensation, the number of covered workers and their covered wages must be estimated. The Academy's methods for estimating coverage are described in Appendix A. In brief, we start with the number of workers and total wages in

**Figure 2**

**Workers' Compensation Medical and Cash Benefits Per \$100 of Covered Wages, 1980–2009**



Source: National Academy of Social Insurance estimates.

*"...in 2009, 97.1 percent of all UI-covered workers and wages were covered by workers' compensation."*

each state that are covered by unemployment insurance (UI). Approximately 96% of U.S. wage and salary workers are covered by UI (NASI, 2002). We subtract from UI coverage, the estimates of the workers and wages that are not required to be covered by workers' compensation because of exemptions for small firms and farm employers and because coverage for employers in Texas is voluntary. Using these methods we estimate that in 2009, 97.1 percent of all UI-covered workers and wages were covered by workers' compensation.<sup>6</sup> Self-employed

persons are not typically covered by unemployment insurance or by workers' compensation. In some instances self-employed persons may elect to be covered for workers' compensation.

NASI's coverage estimates seek to count the number of workers who are legally required to be covered under the state laws. The methodology may undercount the number of persons who are actually covered. For example, in some states, self-employed persons may voluntarily elect to be covered and in those states with numerical exemptions, some small firms may voluntarily purchase workers' compensation insurance. The NASI methodology may also overestimate the number of workers actually covered by workers' compensation. Several recent studies have found that actual coverage is less than legally required coverage because of evasive strategies used by employ-

6 According to unpublished estimates provided by the Bureau of Labor Statistics, only 3 percent of all employees who worked for employers who participated in the BLS National Compensation Survey (NCS) were employed in establishments that reported zero workers' compensation costs. The 3 percent figure was for all employees covered by the survey, as well as for employees in the private sector and employees in the state and local government sector. The NASI estimate of legally required coverage has a national average (97.1 percent of all UI covered workers in 2009) that is virtually identical to the workers' compensation coverage shown by the NCS.

ers, such as not reporting employees or misclassifying them as independent contractors (Greenhouse, 2008; FPI, 2007). As a practical matter, NASI lacks the information needed to systematically estimate compliance or non-compliance with state laws.

## State and National Trends in Coverage

In 2009, workers' compensation covered an estimated 124.9 million workers, a decrease of 4.4 percent from the 130.6 million workers covered in 2008 (Table 2). Total wages of covered workers were \$5.7 trillion in 2009, a decrease of 4.7 percent from 2008.

Because the workers' compensation coverage rules did not change significantly between 2008 and 2009, differences in growth rates of covered employment and wages among states generally reflect changes in the states' overall employment and wages. In Texas, where workers' compensation is voluntary for employers, coverage increased from 76 percent of workers in 2008 to 79 percent in 2009 according to surveys of Texas employers. All states except Texas recorded a fall in employment in 2009. With regard to wages covered under workers' compensation, 49 jurisdictions registered decreases in 2009 from 2008 and only Alaska and North Dakota recorded an increase in wages (Table 3).

## Workers' Compensation Benefits

### Types of Benefits

Workers' compensation pays for medical care immediately and pays cash benefits for lost work time after a three-to-seven-day waiting period. Most workers' compensation cases do not involve lost work time greater than the waiting period for cash benefits. In these cases, only medical benefits are paid. "Medical only" cases are quite common, but they represent a small share of benefit payments. Medical-only cases accounted for 77 percent of workers' compensation cases, but only 8 percent of all benefits paid for 41 NCCI covered states for policy years spanning 1998–2006 (NCCI, 2010). The remaining 23 per-

cent of cases that involved cash benefits accounted for 92 percent of benefits for cash and medical care combined.

Cash benefits differ according to the duration and severity of the worker's disability. Temporary total disability benefits are paid when the worker is temporarily precluded from performing the pre-injury job or another job for the employer that the worker could have performed prior to the injury. Most states pay weekly benefits for temporary total disability that replace two-thirds of the worker's pre-injury wage (tax free), subject to a dollar maximum that varies from state to state. The maximum weekly benefit for temporary total disability (TTD) ranged from \$1,366 in Iowa to \$399 in Mississippi as of July 2009. Nine jurisdictions had a maximum of \$1,000 or more: Connecticut, District of Columbia, Illinois, Iowa, Massachusetts, New Hampshire, Oregon, Vermont, and Washington. The eleven states with a maximum of weekly TTD benefits of less than \$600 include Arizona, Arkansas, Georgia, Idaho, Kansas, Louisiana, Maine, Mississippi, New York, Oklahoma, and South Dakota.<sup>7</sup>

*"...23% of cases that involved cash benefits accounted for 92% of benefits..."*

For most lost time injuries, workers fully recover, return to work, and benefits end. In some cases, they return to work before they reach maximum medical improvement, usually with restricted duties and lower pay. In those cases, they receive temporary partial disability benefits in most states. Temporary disability benefits are the most common type of cash benefits. They account for 62 percent of cases involving cash benefits and 17 percent of benefits incurred (Figure 3). If a worker has severe impairments that are judged to be permanent after he or she reaches maximum medical improvement, permanent total disability benefits might be paid. These cases are relatively rare. Permanent total disabilities, together

7 Details on benefit provisions of state laws are compiled in *Workers' Compensation Laws, 2nd Edition*, issued jointly by the IAIABC (International Association of Industrial Accident Board and Commissions) and the WCRI (Workers Compensation Research Institute) and are summarized in Appendix I.

**Table 3****Number of Workers Covered by Workers' Compensation and Total Covered Wages, By State, 2005–2009**

	Covered Workers (in thousands)					Covered Wages (in millions)					
	2005	2006	2007	2008	2009	2005	2006	2007	2008	2009	2008-2009 % Change
Alabama	1,763	1,797	1,823	1,808	1,702	\$59,734	\$63,733	\$66,881	\$68,530	\$65,522	-4.4
Alaska	285	291	294	298	297	11,145	11,829	12,576	13,344	13,664	2.4
Arizona	2,438	2,562	2,595	2,529	2,340	92,048	101,587	106,805	106,477	99,095	-6.9
Arkansas	1,092	1,112	1,119	1,117	1,078	33,674	35,512	37,684	38,472	37,932	-1.4
California	14,992	15,256	15,395	15,248	14,377	689,220	734,344	774,856	781,948	737,852	-5.6
Colorado	2,137	2,190	2,241	2,247	2,137	87,206	93,534	99,900	103,687	99,015	-4.5
Connecticut	1,624	1,652	1,666	1,668	1,596	85,989	90,531	96,705	97,322	92,085	-5.4
Delaware	412	417	418	416	395	18,370	19,259	19,727	19,720	18,811	-4.6
District of Columbia	474	479	487	491	482	28,975	31,082	33,345	34,822	34,195	-1.8
Florida	7,309	7,498	7,504	7,177	6,689	266,392	285,969	295,537	288,339	271,057	-6.0
Georgia	3,751	3,838	3,891	3,831	3,592	144,796	153,029	162,094	161,107	151,782	-5.8
Hawaii	572	586	594	587	559	20,170	21,527	22,751	23,213	22,355	-3.7
Idaho	601	631	648	640	600	18,234	20,259	21,433	21,398	20,173	-5.7
Illinois	5,660	5,733	5,782	5,741	5,452	246,223	260,371	274,339	278,314	262,097	-5.8
Indiana	2,827	2,845	2,858	2,823	2,655	99,459	103,263	106,460	107,620	100,758	-6.4
Iowa	1,428	1,453	1,467	1,460	1,415	46,958	49,539	52,115	53,625	52,217	-2.6
Kansas	1,272	1,293	1,324	1,342	1,283	42,610	45,708	48,589	50,775	48,760	-4.0
Kentucky	1,717	1,738	1,760	1,748	1,667	57,711	60,527	63,553	64,742	62,585	-3.3
Louisiana	1,807	1,776	1,837	1,853	1,813	59,917	64,267	69,554	74,131	72,822	-1.8
Maine	581	584	588	585	564	18,636	19,387	20,272	20,854	20,270	-2.8
Maryland	2,372	2,405	2,422	2,407	2,326	101,405	107,102	112,688	114,895	112,865	-1.8
Massachusetts	3,110	3,146	3,185	3,197	3,087	155,261	164,373	175,410	180,867	172,995	-4.4
Michigan	4,148	4,085	4,031	3,904	3,608	170,240	171,402	173,932	171,902	156,539	-8.9
Minnesota	2,607	2,637	2,655	2,631	2,521	105,878	110,727	117,268	120,038	113,658	-5.3

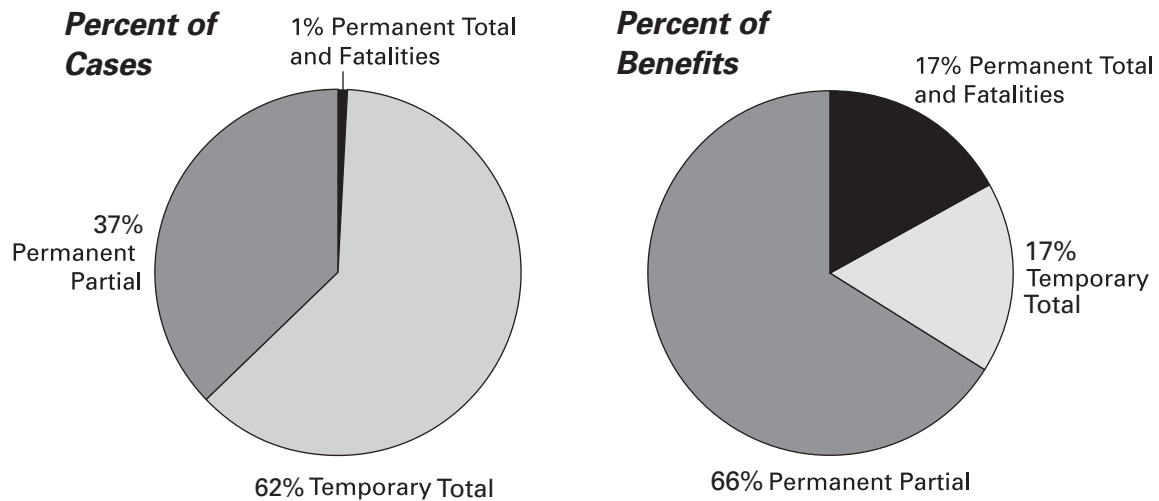
Mississippi	1,032	1,042	1,057	1,053	1,004	-4.7	30,123	31,895	33,524	34,653	33,309	-3.9
Missouri	2,499	2,532	2,555	2,541	2,435	-4.2	88,993	93,134	97,736	101,623	96,414	-5.1
Montana	400	413	423	424	407	-3.9	11,342	12,304	13,303	13,792	13,415	-2.7
Nebraska	876	886	901	898	876	-2.5	28,106	29,637	31,420	32,219	31,755	-1.4
Nevada	1,197	1,253	1,265	1,234	1,118	-9.3	46,104	49,863	53,018	52,688	47,442	-10.0
New Hampshire	613	619	622	621	597	-3.8	24,714	26,140	27,104	27,714	26,659	-3.8
New Jersey	3,856	3,890	3,900	3,875	3,712	-4.2	190,048	200,091	209,120	213,418	203,895	-4.5
New Mexico	720	748	763	766	734	-4.2	22,790	25,116	26,986	28,284	27,486	-2.8
New York	8,220	8,302	8,427	8,462	8,198	-3.1	426,395	460,017	500,392	509,954	472,646	-7.3
North Carolina	3,707	3,812	3,909	3,866	3,645	-5.7	132,140	141,640	150,910	152,519	143,984	-5.6
North Dakota	316	323	330	338	337	-0.3	9,313	9,978	10,720	11,686	11,952	2.3
Ohio	5,232	5,238	5,230	5,159	4,866	-5.7	193,622	200,236	206,919	208,573	197,125	-5.5
Oklahoma	1,420	1,461	1,489	1,499	1,379	-8.0	43,994	48,671	51,750	54,861	52,617	-4.1
Oregon	1,623	1,671	1,699	1,684	1,578	-6.3	58,792	63,001	66,588	67,559	63,646	-5.8
Pennsylvania	5,446	5,503	5,549	5,535	5,344	-3.5	214,203	225,608	237,990	243,716	237,464	-2.6
Rhode Island	468	471	470	459	438	-4.6	17,865	18,771	19,304	19,480	18,725	-3.9
South Carolina	1,725	1,759	1,795	1,780	1,670	-6.2	56,244	59,723	62,910	63,862	60,680	-5.0
South Dakota	365	373	381	383	374	-2.2	10,410	11,068	11,828	12,331	12,247	-0.7
Tennessee	2,537	2,579	2,598	2,575	2,422	-6.0	89,989	95,817	100,434	101,910	96,327	-5.5
Texas	7,193	7,498	7,636	7,651	7,818	2.2	286,422	315,913	338,828	349,132	336,402	-3.6
Utah	1,080	1,135	1,184	1,182	1,118	-5.4	35,320	39,176	43,139	44,198	42,389	-4.1
Vermont	295	297	297	294	284	-3.6	9,962	10,440	10,864	11,152	10,870	-2.5
Virginia	3,348	3,401	3,437	3,418	3,290	-3.8	137,742	145,707	153,522	156,661	153,518	-2.0
Washington	2,697	2,781	2,857	2,817	2,697	-4.3	108,677	118,182	127,500	130,084	126,855	-2.5
West Virginia	673	683	684	669	650	-2.8	20,550	21,770	22,714	23,418	23,325	-0.4
Wisconsin	2,657	2,679	2,694	2,668	2,539	-4.9	93,822	98,170	102,040	103,920	98,859	-4.9
Wyoming	247	260	270	279	267	-4.3	8,087	9,400	10,499	11,461	10,746	-6.2
Total non-federal	125,424	127,610	129,007	127,881	122,029	-4.6	5,049,814	5,374,520	5,680,035	5,771,232	5,483,956	-5.0
Federal employees	2,734	2,729	2,726	2,762	2,827	2.3	163,663	169,525	176,858	183,095	191,510	4.6
TOTAL	128,158	130,339	131,734	130,643	124,856	-4.4	5,213,478	5,544,045	5,856,893	5,954,327	5,675,466	-4.7

Source: National Academy of Social Insurance estimates. See Appendix A.



**Figure 3**

**Types of Disabilities in Workers' Compensation Cases with Cash Benefits, 2006**



Cases classified as permanent partial include cases that are closed with lump sum settlements. Benefits paid in cases classified as permanent partial, permanent total and fatalities can include any temporary total disability benefits also paid in such cases. The data are from the first report from the NCCI *Annual Statistical Bulletin*.

Source: *Annual Statistical Bulletin*, NCCI 2009, Exhibits X and XII.

with fatalities, account for one percent of all cases that involve cash benefits, and 17 percent of total cash benefit payments (Figure 3). All these exclude 'medical only' cases.

*“Permanent partial disabilities account for 37 percent of cases that involve any cash payments and for 66 percent of benefit payments.”*

Permanent partial disability benefits are paid when the worker has physical impairments that, although permanent, do not completely limit the worker's ability to work. States differ in their methods for determining whether a worker is entitled to permanent partial benefits, the degree of partial disability, and the amount of benefits to be paid (Barth and Niss, 1999; Burton, 2005). In some states, the permanent partial disability benefit begins after maximum medical improvement has been achieved. In some cases permanent disability benefits can

simply be the extension of temporary disability benefits until the disabled worker returns to employment. Cash benefits for permanent partial disability are frequently limited to a specified duration or an aggregate dollar limit. Permanent partial disabilities account for 37 percent of cases that involve any cash payments and for 66 percent of benefit payments. An in-depth study examined the likelihood that workers' compensation claimants would receive permanent partial disability benefits. It focused on individuals in six states who had experienced more than seven days of lost work time. Those who subsequently received permanent partial benefits ranged from about three in ten in one state to more than half of cases with at least one week of lost work time in two other states (Barth, Helvacian, and Liu, 2002). Methods for compensating permanent impairments fall into several broad categories (Barth, 2004). About 44 jurisdictions use a schedule for at least some injury types—a list of body parts that are covered. Typically, a schedule appears in the underlying statute and lists benefits to be paid for specific losses (e.g. the loss of a finger). These schedules include the upper and lower extremities and may also include one or both eyes. Most state schedules

also include the loss of hearing in one or both ears. Injuries to the spine that are permanently disabling are typically not scheduled, nor are injuries to internal organs, head injuries, and occupational diseases. For unscheduled conditions, the approaches used can be categorized into four methods:

- An *impairment-based approach*, used in 19 states, is most common. In approximately 14 of these states, a worker with an unscheduled permanent partial disability receives benefits based entirely on the degree of impairment with or without a formula that takes into account the personal characteristics of the injured worker. Any future earnings losses of the worker are not considered.
- A *loss-of-earning-capacity approach* is used in 13 states. This approach links the benefit to the worker's ability to earn or to compete in the labor market and involves a forecast of the economic impact that the impairment will have on the worker's future earnings.
- In a *wage-loss approach*, used in 10 states, benefits are paid for the actual or ongoing earnings losses that a worker incurs.
- In a *bifurcated approach*, used in ten jurisdictions, the benefit for a permanent disability depends on the worker's employment status at the time that the worker's condition is assessed, after the condition has stabilized. If the worker has returned to employment with earnings at or near the pre-injury level, the benefit is based on the degree of impairment. If the worker has not returned to employment, or has returned but at lower wages than before the injury, the benefit is based on the degree of lost earning capacity.

In Massachusetts, Montana, Rhode Island, and Oregon (since 2005), injured workers can qualify for two tracks of permanent partial disability benefits paid concurrently. One is designed to compensate for work disability and the other is designed to compensate for noneconomic loss (Burton, 2008). The noneconomic loss benefits are known as impairment benefits in Oregon and as specific injuries in Massachusetts. Florida also used the concurrent or dual benefits approach from 1979 to 1990, where one track of benefits was based on the extent of actual wage loss and the other on the degree of permanent impairment.

## Methods for Estimating Benefits Paid

Our estimates of workers' compensation benefits paid are based on three main sources: responses to the Academy's questionnaire from state agencies, data from the National Association of Insurance Commissioners (NAIC), and data purchased from A.M. Best, a private company that specializes in collecting insurance data and rating insurance companies. The A.M. Best data used for this report show benefits paid in each state for 2005 through 2009. They include information for all private carriers in every state and for eighteen of the twenty-six state funds, but do not include any information about the remaining state funds, self-insured employers, or benefits paid under deductible arrangements. Under deductible policies written by private carriers or state funds, the insurer pays all of the workers' compensation benefits, but employers are responsible for reimbursing the insurer for those benefits up to a specified deductible amount.

Deductibles may be written into an insurance policy on a per-injury basis, an aggregate basis, or a combination of a per-injury basis with an aggregate cap. States vary in the maximum deductibles they allow. In return for accepting a policy with a deductible, the employer pays a lower premium. Appendix B shows the survey questionnaire and Appendix C summarizes the kinds of data each state reported. States had the most difficulty reporting amounts of benefits paid under deductible arrangements. The Academy's methods for estimating these benefits are described in Appendix G. If states were unable to report benefits paid by self-insured employers, these amounts had to be estimated; the methods for estimating self-insured benefits are described in Appendix E.

In addition to private carriers, state funds, and self-insurance, many states also have second injury funds, which are described in Appendix C. The data for second injury fund payments are included in Appendix Table J1 and nationally resulted in more than 1 billion of paid benefits in each year from 2005 to 2009. Last year's NASI report was the first time the benefit data in the report contained second injury fund data, which in Table 4 are distributed across private carrier, state fund, and self-insurance benefits data according to the share of benefits paid by these three types of insurance arrangements in each state. Second injury

**Table 4****Workers' Compensation Benefits by Type of Insurer and Share of Medical Benefits, 1960–2009 (in millions)**

Year	Total Benefits		Private Carriers(a)		State Funds(a)		Federal(b)		Self-Insured		Medical	
	Total	Percent Change	Total	Percent Share	Total	Percent Share	Total	Percent Share	Total	Percent Share	Total	Percent Medical
1960	\$1,295	11.0	\$810	62.5	\$264	20.4	\$61	4.7	\$160	12.4	\$435	33.6
1961	1,374	6.1	851	61.9	284	20.7	63	4.6	176	12.8	460	33.5
1962	1,489	8.4	924	62.1	305	20.5	66	4.4	194	13.0	495	33.2
1963	1,583	6.3	988	62.4	318	20.1	70	4.4	207	13.1	525	33.2
1964	1,708	7.9	1,070	62.6	339	19.8	73	4.3	226	13.2	565	33.1
1965	1,813	6.1	1,124	62.0	371	20.5	74	4.1	244	13.5	600	33.1
1966	2,000	10.3	1,239	62.0	404	20.2	82	4.1	275	13.8	680	34.0
1967	2,190	9.5	1,363	62.2	430	19.6	94	4.3	303	13.8	750	34.2
1968	2,376	8.5	1,482	62.4	451	19.0	105	4.4	338	14.2	830	34.9
1969	2,634	10.9	1,641	62.3	486	18.5	121	4.6	386	14.7	920	34.9
1970	3,030	15.0	1,843	60.8	497	16.4	258	8.5	432	14.3	1,050	34.7
1971	3,563	17.6	2,005	56.3	549	15.4	549	15.4	460	12.9	1,130	31.7
1972	4,062	14.0	2,179	53.6	633	15.6	746	18.4	504	12.4	1,250	30.8
1973	5,104	25.7	2,514	49.3	720	14.1	1,278	25.0	592	11.6	1,480	29.0
1974	5,781	13.3	2,971	51.4	823	14.2	1,263	21.8	724	12.5	1,760	30.4
1975	6,598	14.1	3,422	51.9	957	14.5	1,367	20.7	852	12.9	2,030	30.8
1976	7,585	15.0	3,976	52.4	1,088	14.3	1,482	19.5	1,039	13.7	2,380	31.4
1977	8,629	13.8	4,629	53.6	1,209	14.0	1,541	17.9	1,250	14.5	2,680	31.1
1978	9,796	13.5	5,256	53.7	1,221	12.5	1,822	18.6	1,497	15.3	2,980	30.4
1979	12,027	22.8	6,157	51.2	1,709	14.2	2,313	19.2	1,848	15.4	3,520	29.3
1980	13,618	13.2	7,029	51.6	1,797	13.2	2,533	18.6	2,259	16.6	3,947	29.0
1981	15,054	10.5	7,876	52.3	2,017	13.4	2,578	17.1	2,583	17.2	4,431	29.4
1982	16,408	9.0	8,647	52.7	2,191	13.4	2,577	15.7	2,993	18.2	5,058	30.8
1983	17,575	16.7	9,265	52.7	2,443	13.9	2,618	14.9	3,249	18.5	5,681	32.3
1984	19,686	12.0	10,610	53.9	2,754	14.0	2,651	13.5	3,671	18.6	6,424	32.6
1985	22,217	12.9	12,341	55.5	3,059	13.8	2,685	12.1	4,132	18.6	7,498	33.7
1986	24,613	10.8	13,827	56.2	3,554	14.4	2,694	10.9	4,538	18.4	8,642	35.1
1987	27,317	11.0	15,453	56.6	4,084	15.0	2,698	9.9	5,082	18.6	9,912	36.3
1988	30,703	12.4	17,512	57.0	4,687	15.3	2,760	9.0	5,744	18.7	11,507	37.5
1989	34,316	11.8	19,918	58.0	5,205	15.2	2,760	8.0	6,433	18.7	13,424	39.1
1990	38,237	11.4	22,222	58.1	5,873	15.4	2,893	7.6	7,249	19.0	15,187	39.7
1991	42,187	10.3	24,515	58.1	6,713	15.9	2,998	7.1	7,962	18.9	16,832	39.9
1992	44,660	5.9	24,030	53.8	7,829	17.5	3,158	7.1	9,643	21.6	18,664	41.8
1993	42,925	-3.9	21,773	50.7	8,105	18.9	3,189	7.4	9,857	23.0	18,503	43.1
1994	43,482	1.3	21,391	49.2	7,398	17.0	3,166	7.3	11,527	26.5	17,194	39.5
1995	42,122	-3.1	20,106	47.7	7,681	18.2	3,103	7.4	11,232	26.7	16,733	39.7
1996	41,960	-.4	21,024	50.1	8,042	19.2	3,066	7.3	9,828	23.4	16,739	39.9
1997	41,971	.0	21,676	51.6	7,157	17.1	2,780	6.6	10,357	24.7	17,397	41.5
1998	43,987	4.8	23,579	53.6	7,187	16.3	2,868	6.5	10,354	23.5	18,622	42.3
1999	46,313	5.3	26,383	57.0	7,083	15.3	2,862	6.2	9,985	21.6	20,055	43.3
2000	47,699	3.0	26,874	56.3	7,388	15.5	2,957	6.2	10,481	22.0	20,933	43.9
2001	50,827	6.6	27,905	54.9	8,013	15.8	3,069	6.0	11,839	23.3	23,137	45.5
2002	52,297	2.9	28,085	53.7	9,139	17.5	3,154	6.0	11,920	22.8	24,203	46.3
2003	54,739	4.7	28,395	51.9	10,442	19.1	3,185	5.8	12,717	23.2	25,733	47.0
2004	56,149	2.6	28,632	51.0	11,146	19.9	3,256	5.8	13,115	23.4	26,079	46.4
2005	57,067	1.6	29,039	50.9	11,060	19.4	3,258	5.7	13,710	24.0	26,361	46.2
2006	55,118	-3.4	28,050	50.9	10,551	19.1	3,270	5.9	13,246	24.0	26,325	47.8
2007	55,998	1.6	28,736	51.3	10,323	18.4	3,340	6.0	13,599	24.3	27,037	48.3
2008	58,104	3.8	30,175	51.9	10,438	18.0	3,424	5.9	14,067	24.2	29,256	50.4
2009	58,327	.4	30,460	52.2	10,118	17.3	3,543	6.1	14,207	24.4	28,940	49.6



## Table 4 continued

- (a) Estimated benefits paid under deductible provisions are included beginning in 1992. Benefits are payments in the calendar year to injured workers and to providers of their medical care.
- (b) In all years, federal benefits includes those paid under the Federal Employees' Compensation Act for civilian employees and the portion of the Black Lung benefit program that is financed by employers and are paid through the federal Black Lung Disability Trust Fund. In years before 1997, federal benefits also include the other part of the Black Lung program that is financed solely by federal funds. In 1997–2009, federal benefits also include a portion of employer-financed benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data—namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Source: National Academy of Social Insurance estimates. See Appendices B and H. SSA's Annual Statistical Supplement, 2010 and DOL, 2011

*"In addition to private carriers, state funds, and self-insurance, many states also have second injury funds..."*

funds reimburse employers or insurance carriers for part of workers' compensation benefits in certain instances when an employee with a pre-existing impairment suffers a further work-related injury or disease. The employer is responsible for workers' compensation benefits only for the second injury or disease. The purpose of second injury funds is to encourage employers to hire disabled workers. Second injury funds are financed through general state revenues or assessments on workers' compensation insurers and self-insuring employers.

*"Many states also have one or more funds that guarantee payment of benefits in case private carriers or self-insuring employers are unable to make payments..."*

Many states also have one or more funds that guarantee payment of benefits in case private carriers or self-insuring employers are unable to make payments because of insolvency. The guaranty funds are described in Appendix C, and the data on benefits

paid by these guarantee funds from 2005 to 2009 are shown in Appendix Tables J2 and J3. This is the second year that we have included benefits paid by guaranty funds in total benefits paid. The benefits paid by guaranty funds for private carriers are included in the total of benefit payments by private carriers in Table 4 and the benefits paid by guaranty funds for self-insuring employers are included in the self-insured employers benefit payments in Table 4. Last year's report was also the first to include payments by second injury funds and guaranty funds in the state data and in the national data used throughout the report. We have revised our estimates of state benefit payments for 2005 to 2008 to include these payments, as shown in Appendix Tables D1 to D4, and these revised state data are included in our revised data on benefits payments. Medical benefits were estimated based on information from the National Council on Compensation Insurance (NCCI) for most states. Where NCCI data were not available, medical benefits were based on reports from the states. Methods for estimating medical benefits are described in Appendix F.

In last year's data report, we had also made significant changes in the procedures used to estimate benefit payments for some states. For example, in California, we had included not only benefit payments (or losses, to use the insurance terminology included in the *Glossary*) but also medical cost containment expenses in our data on paid benefits in previous editions of the NASI report on workers' compensation benefits, coverage, and costs. In other states, we restricted our data to benefit payments and excluded medical cost containment expenses from

our estimates of paid benefits. We have revised the California data from 2001 onwards to include, only paid benefits for California (and not medical cost containment expenses) for medical benefits in California. For example, in 2009, about 14.1 percent of the total medical payments were for medical cost containment expenses. California being a large state, any adjustment of the medical benefit payments to exclude the medical cost containment expenses affects the nation's changes in medical benefit payments.

A detailed, state-by-state explanation of how the estimates in this report are produced is provided in *Sources and Methods: A Companion to Workers' Compensation: Benefits, Coverage, and Costs, 2009* on the Academy's website at [www.nasi.org](http://www.nasi.org).

## National Trends in Cash and Medical Benefits

On the national level, total benefits (cash plus medical) were 0.4 percent higher in 2009 than in 2008. This national increase in benefit payments was solely due to an increase in cash benefits of 1.9 percent, since medical benefits decreased by 1.1 percent between 2008 and 2009 (Table 1).

*"During the current decade, medical benefits generally grew more rapidly than cash benefits, in 2009 they accounted for 49.6 of all benefits paid during the year."*

The share of paid benefits accounted for by medical benefits from 1960 to 2009 is shown in Table 4 and Figure 4. Medical benefits accounted for 33.1 percent to 34.9 percent of all benefit payments in the 1960s, and then generally declined during the 1970s until reaching a low point of 29.0 percent of benefit payments in 1980. Since then, medical benefits have increased their share from 39.7 percent of all benefits in 1990 to 43.9 percent by 2000 and to 49.6 percent in 2009. During most of the current decade, medical benefits continued to grow more rapidly than cash benefits, although in 2009 there was a

slight drop and medical benefits accounted for 49.6 of all benefits paid during the year.

## National Trends in Benefits by Insurance Provider

Workers' compensation benefits are paid by private insurance carriers, by state or federal workers' compensation funds, or by self-insuring employers. Table 4 provides data on workers' compensation benefits by type of insurer for 1960 through 2009.

Private insurance carriers remained the largest source of workers' compensation benefits in 2009, when they accounted for 52.2 percent of benefits paid. Private carriers currently are allowed to sell workers' compensation insurance in all but four states that have exclusive state funds—Ohio, North Dakota, Washington, and Wyoming. As shown in Table 4, the share of benefits paid by private carriers has varied between 47.7 and 62.6 percent since 1960.<sup>8</sup>

The share of benefits paid by state workers' compensation funds has varied from 12.5 percent to 20.7 percent since 1960. The share of benefits provided by state funds declined from 18.0 percent in 2008 to 17.3 percent in 2009. A total of twenty-six states had state funds that paid workers' compensation in 2009. They include the four exclusive state fund states (plus West Virginia, where the former exclusive state fund continued to pay benefits), and twenty-one others in which the state funds compete with private carriers. In general, state funds are established by an act of the state legislature, have at least part of their board appointed by the governor, are usually exempt from federal taxes, and typically serve as the insurer of last resort—that is, provide insurance coverage to employers who have difficulty purchasing it privately. Not all state funds meet all these criteria, however. In some cases, it is not altogether clear whether an entity is a state fund or a private insurer, or whether it is a state fund or a state entity that is self-insuring workers' compensation benefits for its own employees. Consequently, the Academy's expert panel decided to classify as state funds all twenty-six entities that are members of the American Association of State Compensation Insurance Funds (AASCIF, 2010). This includes the South Carolina fund, which is the required insurer for state employees and is available to

8 The West Virginia exclusive state fund was no longer selling policies in 2009 but was still paying benefits in 2009 for policies sold in previous years.

*“Private insurance carriers remained the largest source of workers’ compensation benefits in 2009, when they accounted for 52.2 percent of benefits paid.”*

cities and counties to insure their employees, but does not insure private employers.

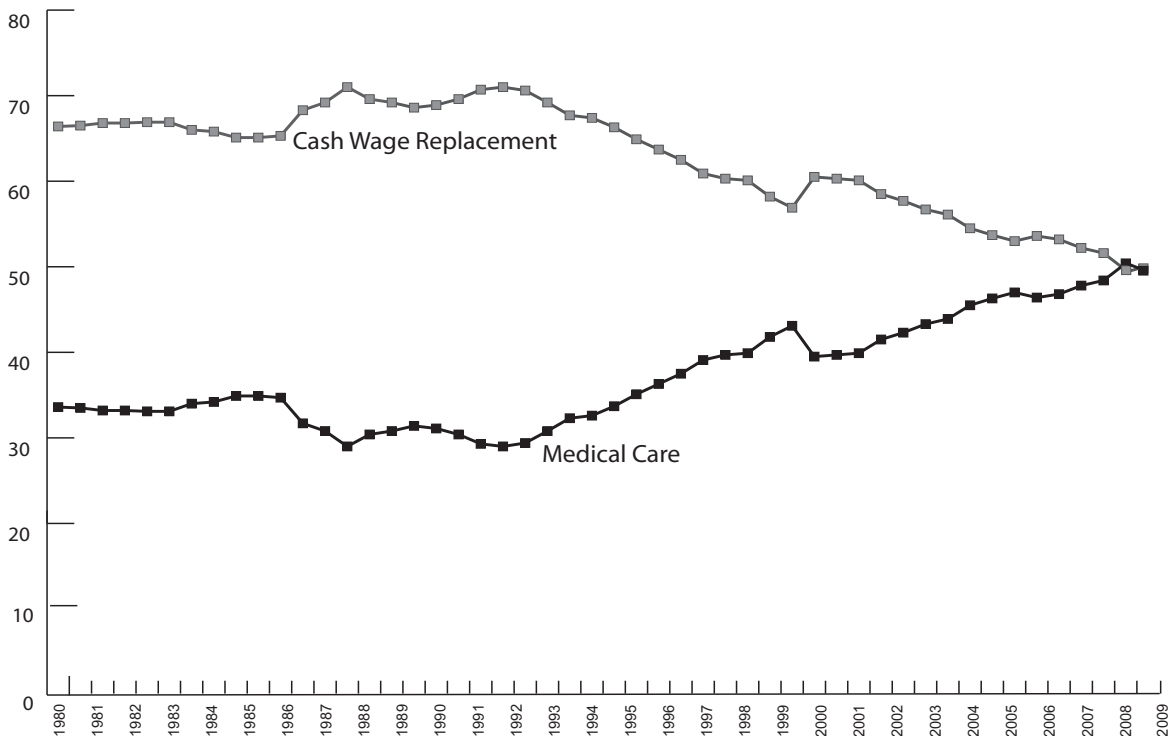
Payments of workers’ compensation benefits by federal funds have varied between 4.1 and 25.0 percent of all benefit payments since 1960. In the early years, the federal data included FECA (Federal Employees Compensation Act) and Black Lung Part B. Black Lung Part B started paying benefits in 1970, and saw large increases in 1973, nearly doubling its payout to about \$1 billion. That was the sole cause of the big increase in federal funds those years. The federal share declined from 7.4 percent of all benefit payments in 1995 to 6.1 percent in 2009. These

benefits include payments under FECA for civilian employees and the portion of the Black Lung benefit program that is financed by employers and paid through the federal Black Lung Disability Trust Fund. Federal benefits also include benefits under the Longshore and Harbor Workers’ Compensation Act that are paid by self-insured employers and by special funds under that Act. More details about these federal programs are in Appendix H.

The share of benefits accounted for by self-insuring employers has varied between 11.6 and 26.7 percent since 1960. Since 2000, the share has been relatively stable, varying from 22.0 to 24.4 percent. Employers are allowed to self-insure for workers’ compensation in all states except North Dakota and Wyoming, which require all employers to obtain insurance from their state funds. In other states, employers may apply for permission from the regulatory authority to self-insure their risk for workers’ compensation benefits if they prove they have the financial capacity to do so. Many large employers choose to self-insure. Some states permit groups of employers in the same industry or trade association to self-insure through

**Figure 4**

**Share of Medical and Cash Benefits, 1960–2009**



Source: National Academy of Social Insurance estimates.

group self-insurance. Benefits provided under group self-insurance are included with the self-insured benefits in this report.

*“The share of benefits accounted for by self-insuring employers has varied between 11.6 and 26.7 percent since 1960.”*

## National Trends in Deductibles and Self Insurance

Under deductible policies written by private carriers or state funds, the insurer pays all of the workers’ compensation benefits, but employers are required to

reimburse the insurers for those benefits up to a specified deductible amount, or pay claims themselves up to the deductible amount. In Table 4, the deductible amounts were attributed to the private carriers or state funds that initially paid the benefits. In this subsection, the deductible amounts are attributed to the employers who are required to reimburse the insurers for the deductible amounts.

Prior to the 1990s, policies with large deductibles were not in vogue, but their popularity grew in the mid 1990s. In 1992, benefits under deductible policies totaled \$1.3 billion, or about 2.8 percent of total benefits (Table 5). By 2000 they had risen to \$6.2 billion, or 13.0 percent of total benefits. In 2009, deductibles totaled \$8.0 billion, which was 13.8 percent of total benefits paid. Table 5 shows separately

**Table 5**

**Estimated Employer-Paid Benefits under Deductible Provisions for Workers’ Compensation, 1992–2009 (in millions)**

Year	Total	Private Carriers	State Funds	Deductibles as a % of Total Benefits
1992	\$1,250	\$1,250	*	2.8
1993	2,027	2,008	\$ 19	4.7
1994	2,834	2,645	189	6.5
1995	3,384	3,060	324	8.0
1996	3,716	3,470	246	8.9
1997	3,994	3,760	234	9.5
1998	4,644	4,399	245	10.6
1999	5,684	5,452	232	12.3
2000	6,201	5,931	270	13.0
2001	6,388	6,085	303	12.6
2002	6,922	6,511	411	13.2
2003	8,020	7,547	474	14.7
2004	7,645	7,134	510	13.6
2005	7,798	7,290	508	13.7
2006	7,673	7,152	521	13.9
2007	7,841	7,311	530	14.0
2008	8,050	7,531	518	13.9
2009	8,037	7,547	490	13.8

\* Negligible

Note: Data on deductible benefits were available from seven states. Five states do not allow policies with deductibles. For twelve states data were computed by subtracting various components from total benefit figures provided. For the other twenty-six states and the District of Columbia, deductible benefits were calculated using a ratio of the manual equivalent premiums.

the estimated dollar amount of benefits that employers paid under deductible provisions with each type of insurance.

Employers who have policies with deductibles are, in effect, self-insuring up to the amount of the deductible. That is, they are bearing that portion of the financial risk. Adding deductibles to self-insured

benefit payments shows the share of the total market where employers are assuming financial risk (as shown in Column (9) of Table 6). This share of total benefit payments for which employers assumed the financial risks rose rapidly from 24.4 percent in 1992 to 34.7 percent in 1995, and then remained between 32 and 36 percent of total benefits through 2002.

Between 2003 and 2009 the employers' share of paid

**Table 6**

**Total Amount and Percentage Distribution of Workers' Compensation Benefit Payments by Type of Insurer, 1990–2009**

Year	Total Benefits (in millions)	Percentage Distribution									Total
		Private Carriers			State Funds			Federal <sup>b</sup>	Self-Insured	Self-Insured plus Deductibles	
		All	Deductibles <sup>a</sup>	All without deductibles	All	Deductibles <sup>a</sup>	All without deductibles				
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	9=(2)+(5)+(8)	10=(1)+(4)+(7)+(8)		
1990	\$38,237	58.1	*	58.1	15.4	*	15.4	7.6	19.0	19.0	100.0
1991	42,187	58.1	*	58.1	15.9	*	15.9	7.1	18.9	18.9	100.0
1992	44,660	53.8	2.8	51.0	17.5	*	17.5	7.1	21.6	24.4	100.0
1993	42,925	50.7	4.7	46.0	18.9	*	18.9	7.4	23.0	27.6	100.0
1994	43,482	49.2	6.1	43.1	17.0	0.4	16.6	7.3	26.5	33.0	100.0
1995	42,122	47.7	7.3	40.5	18.2	0.8	17.5	7.4	26.7	34.7	100.0
1996	41,960	50.1	8.3	41.8	19.2	0.6	18.6	7.3	23.4	32.3	100.0
1997	41,971	51.6	9.0	42.7	17.1	0.6	16.5	6.6	24.7	34.2	100.0
1998	43,987	53.6	10.0	43.6	16.3	0.6	15.8	6.5	23.5	34.1	100.0
1999	46,313	57.0	11.8	45.2	15.3	0.5	14.8	6.2	21.6	33.8	100.0
2000	47,699	56.3	12.4	43.9	15.5	0.6	14.9	6.2	22.0	35.0	100.0
2001	50,827	54.9	12.0	42.9	15.8	0.6	15.2	6.0	23.3	35.9	100.0
2002	52,297	53.7	12.4	41.3	17.5	0.8	16.7	6.0	22.8	36.0	100.0
2003	54,739	51.9	13.8	38.1	19.1	0.9	18.2	5.8	23.2	37.9	100.0
2004	56,149	51.0	12.7	38.3	19.9	0.9	18.9	5.8	23.4	37.0	100.0
2005	57,067	50.9	12.8	38.1	19.4	0.9	18.5	5.7	24.0	37.7	100.0
2006	55,118	50.9	13.0	37.9	19.1	0.9	18.2	5.9	24.0	38.0	100.0
2007	55,998	51.3	13.1	38.3	18.4	0.9	17.5	6.0	24.3	38.3	100.0
2008	58,104	51.9	13.0	39.0	18.0	0.9	17.1	5.9	24.2	38.1	100.0
2009	58,327	52.2	12.9	39.3	17.3	0.8	16.5	6.1	24.4	38.1	100.0

\* Negligible

a The percentage of total benefits paid by employers under deductible provisions with this type of insurance.

b Reflects federal benefits included in Table 4.

Source: National Academy of Social Insurance estimates based on Tables 4 and 6.

benefits has stabilized between 37 and 38 percent of benefit payments. As the share of benefits accounted for by employers directly or through deductibles has increased since the early 1990s, the share of private carrier payments net of deductibles has declined: from 58.1 percent of total benefits in 1990 to 39.3 percent of total benefits in 2009 (Table 6, column (3)).

The growth in self-insurance and in deductible policies in the early 1990s, as well as the downturn in self-insurance later in the 1990s, probably reflects dynamics of the insurance market that altered the relative cost to employers of purchasing private insurance vis-à-vis self-insuring as well as the rate of change in underlying system costs. Insurers began offering large-deductible policy options as a way to compete with self-insurance even though, in many cases, insurers were providing first dollar claims administration while receiving less than a first dollar premium. There are several factors influencing employers' decisions to purchase insurance or to self-insure. One is that workers' compensation losses usually involve a high frequency of low-cost claims and a low frequency of high-cost claims. This characteristic of workers' compensation allows large employers to estimate the annual cost generated by these smaller claims so that their cost can be budgeted should the employer decide to self-insure, while the employer can protect itself from the more unpredictable large claims through some form of "excess" insurance arrangement.

*"In 1992, benefits under deductible policies totaled \$1.3 billion, or about 2.8 percent of total benefits. In 2009, deductibles totaled \$8.0 billion, which was 13.8 percent of total benefits paid."*

Residual markets, which in many states are the market of last resort for employers unable to secure workers' compensation coverage, can also influence decisions about whether to purchase insurance or self-insure. This is especially true in markets where the regulated price for such coverage is inadequate and employers in the voluntary market may be subject to higher prices needed to fund insurer

assessments for residual market losses (a similar experience may occur for policyholders of state funds that are the market of last resort).

An employer may also decide to self-insure or partially self-insure because it wishes to either administer its own claims or to be free to select a claims administrator other than the insurer. The timing of tax advantages can also make the purchase of insurance attractive—that is, employers can take an immediate tax deduction for premiums they pay for insurance, while, when they self-insure, tax deductions accrue only later as they pay claims. Burton (2004, pp 11-12) provides another explanation of why some employers purchased insurance policies with large deductibles: "The amount reimbursed by the employer is not considered insurance for purposes of assessments for the residual market or other special funds in most states."

## State Trends in Benefits

Table 7 shows annual changes in state benefit payments between 2005 and 2009. In 27 states benefit payments declined between 2008 and 2009 and 24 states experienced an increase in their benefit payments in 2009. The largest decline was in Virginia, down 21.5 percent. The largest increase was in District of Columbia, where benefits were up by 14.7 percent.

Benefits, and how they are recorded and reported, vary within a state from year to year for many reasons, including:

- Changes in workers' compensation statutes, new court rulings, or new administrative procedures;
- Changes in the mix of occupations or industries, because jobs differ in their rates of injury and illness;
- Fluctuations in employment, because more people working means more people at risk of a job-related illness or injury;
- Changes in wage rates to which benefit levels are linked;
- Variations in health care practice, which influence the costs of medical care;
- Fluctuations in the number and severity of injuries and illnesses for other reasons (for example, in a small state, one industrial acci-



dent involving many workers in a particular year can show up as a noticeable increase in statewide benefit payments);

- Changes in reporting procedures (for example, as state agencies update their record keeping systems, the type of data they are able to report often changes, and new legislation can also affect the data states are able to provide); and
- Changes in the procedures or criteria for reporting lump-sum settlements may affect the amounts in the agreements classified as indemnity payments or medical benefits, thus altering the share of total benefits reported as medical benefits.

*“In the twenty-one states with competitive state funds in 2009, the percentage of benefits accounted for by the state funds varied from 56.3 percent in Idaho to 5.0 percent in Minnesota.”*

## State Benefits by Insurance Providers

The shares of workers’ compensation benefits by type of insurer vary considerably among the states (Table 8). In the four states with exclusive state funds, the shares accounted for by the state funds vary from 100.0 percent in North Dakota and 98.7 percent in Wyoming – states that do not allow self-insurance – to 81.8 percent in Ohio and 76.0 percent in Washington – states that allow qualifying employers to self-insure. Private carriers account for a very small percentage of benefits in these states (other than North Dakota).<sup>9</sup>

In 2008, West Virginia transitioned from being an exclusive state fund state allowing self-insurance to one with private insurance carriers and self-insurance but no state fund as of 2009. During 2009, the state fund still accounted for 55.4 percent of all benefit payments, in part because many workers with

injuries prior to 2009 were still receiving their benefits from the state fund in that year. According to the 2009 Annual Financial Report of the Offices of the Insurance Commissioner in West Virginia, “a significant milestone in the State’s transition of its workers’ compensation system into a competitive insurance market with only private insurance carriers was reached as the insurance market opened to all licensed carriers on July 1, 2008.” As of June 20, 2009, one hundred and fifty four private insurance carriers had written workers’ compensation policies in West Virginia.

In the twenty-one states with competitive state funds in 2009, the percentage of benefits accounted for by the state funds varied from 56.3 percent in Idaho to 5.0 percent in Minnesota. The share of self-insurance in states that allow this insurance arrangement varies widely by state, ranging from highs of 52.4 percent in Alabama to lows of 3.8 percent in South Dakota. (North Dakota and Wyoming do not allow self-insurance.) This wide variation in the share of self-insurance reflects the complex nature of the workers’ compensation insurance market.

## State Trends in Medical Benefits

The share of benefits paid for medical care (as opposed to cash benefits) varies among states (Table 8). In 2009, the share of benefits for medical care ranged from lows of less than 40 percent—in the District of Columbia, Massachusetts, Rhode Island, Washington and West Virginia—to highs of over 60 percent in Alabama, Alaska, Arizona, Arkansas, Florida, Idaho, Indiana, Nebraska, New Hampshire, North Dakota, South Dakota, Utah and Wisconsin.

Many factors in a state can influence the relative share of benefits for medical care as opposed to cash benefits. Among them are:

- Differences in waiting periods for cash benefits and levels of earnings replacement provided by cash benefits, which mean that, all else being equal, states with more generous cash benefits have a lower share of benefits used for medical care;

<sup>9</sup> The presence of private carriers in states with exclusive state funds may be due to policies sold to employers in those states providing multi-state coverage and also because some exclusive funds may be restricted to providing workers’ compensation benefits for the state in which the exclusive state fund issues the policy and might not be permitted to offer employers liability coverage, federal Longshore and Harbor Workers’ Compensation Act coverage, or excess coverage for authorized self-insurers.

**Table 7****Workers' Compensation Benefits\* by State (in thousands) and Annual Percent Change, 2005–2009**

State	Total Benefits					Percent Change			
	2005	2006	2007	2008	2009	2005-2006	2006-2007	2007-2008	2008-2009
Alabama <sup>2</sup>	\$619,518	\$624,685	\$635,315	\$656,607	\$625,755	0.8	1.7	3.4	-4.7
Alaska <sup>2,8</sup>	182,721	186,507	188,286	205,363	213,372	2.1	1.0	9.1	3.9
Arizona <sup>3,8</sup>	570,870	647,427	696,457	691,001	650,730	13.4	7.6	-0.8	-5.8
Arkansas <sup>1,6,7,8</sup>	227,232	235,887	243,846	233,270	216,216	3.8	3.4	-4.3	-7.3
California <sup>2,8</sup>	10,868,330	9,952,220	9,551,491	9,466,406	9,317,794	-8.4	-4.0	-0.9	-1.6
Colorado <sup>1,8</sup>	932,350	903,947	878,774	916,801	884,044	-3.0	-2.8	4.3	-3.6
Connecticut <sup>1,8</sup>	719,974	718,441	729,815	778,187	834,673	-0.2	1.6	6.6	7.3
Delaware <sup>1,5,7,8</sup>	214,540	238,638	212,706	218,484	205,972	11.2	-10.9	2.7	-5.7
District of Columbia <sup>1,5</sup>	92,298	90,468	86,101	80,168	91,940	-2.0	-4.8	-6.9	14.7
Florida <sup>1</sup>	3,474,068	2,925,976	2,915,447	2,835,433	2,977,465	-15.8	-0.4	-2.7	5.0
Georgia <sup>1,5,8</sup>	1,408,876	1,393,970	1,494,363	1,577,091	1,492,696	-1.1	7.2	5.5	-5.4
Hawaii <sup>2,8</sup>	250,779	242,685	247,294	245,763	244,375	-3.2	1.9	-0.6	-0.6
Idaho <sup>1,5,8</sup>	242,823	253,639	267,761	280,810	266,461	4.5	5.6	4.9	-5.1
Illinois <sup>1,5,8</sup>	2,418,519	2,444,219	2,738,920	2,921,600	2,979,286	1.1	12.1	6.7	2.0
Indiana <sup>1,6,8</sup>	569,215	563,934	599,391	625,807	611,792	-0.9	6.3	4.4	-2.2
Iowa <sup>1,5,8</sup>	487,130	488,684	495,808	555,372	556,817	0.3	1.5	12.0	0.3
Kansas <sup>1,6,8</sup>	389,566	390,643	394,280	414,578	418,656	0.3	0.9	5.1	1.0
Kentucky <sup>1,5,8</sup>	702,751	637,975	648,237	702,125	737,392	-9.2	1.6	8.3	5.0
Louisiana <sup>1,8</sup>	705,254	718,535	732,586	855,021	839,580	1.9	2.0	16.7	-1.8
Maine <sup>1</sup>	280,841	289,980	276,826	263,784	263,512	3.3	-4.5	-4.7	-0.1
Maryland <sup>1,8</sup>	784,414	828,962	849,850	935,948	895,905	5.7	2.5	10.1	-4.3
Massachusetts <sup>1,7,8</sup>	921,958	929,507	902,630	855,807	950,390	0.8	-2.9	-5.2	11.1
Michigan <sup>2,8</sup>	1,473,598	1,470,574	1,511,282	1,407,282	1,509,881	-0.2	2.8	-6.9	7.3
Minnesota	949,394	944,448	958,984	1,025,937	1,082,620	-0.5	1.5	7.0	5.5
Mississippi <sup>1,8</sup>	289,855	310,742	322,875	336,103	318,499	7.2	3.9	4.1	-5.2
Missouri <sup>2,8</sup>	892,446	831,325	871,060	906,393	834,075	-6.8	4.8	4.1	-8.0
Montana <sup>2,8</sup>	227,342	234,259	242,872	253,477	254,118	3.0	3.7	4.4	0.3
Nebraska <sup>1,5,8</sup>	305,988	271,992	284,259	323,702	304,156	-11.1	4.5	13.9	-6.0



Nevada <sup>2</sup>	456,660	417,282	414,432	430,260	432,690	-8.6	-0.7	3.8	0.6
New Hampshire <sup>1,5,8</sup>	228,623	220,037	208,422	241,411	230,971	-3.8	-5.3	15.8	-4.3
New Jersey <sup>1,8</sup>	1,702,109	1,748,045	1,849,044	1,951,545	2,002,875	2.7	5.8	5.5	2.6
New Mexico <sup>2,8</sup>	259,259	270,273	273,363	271,396	282,633	4.2	1.1	-0.7	4.1
New York <sup>2,7</sup>	3,378,085	3,510,955	3,388,936	3,859,233	4,146,728	3.9	-3.5	13.9	7.4
North Carolina <sup>1,5</sup>	1,381,606	1,314,725	1,344,761	1,455,740	1,408,926	-4.8	2.3	8.3	-3.2
North Dakota <sup>3</sup>	82,033	81,297	91,741	105,837	110,526	-0.9	12.8	15.4	4.4
Ohio <sup>4</sup>	2,447,038	2,383,544	2,478,080	2,490,080	2,353,384	-2.6	4.0	0.5	-5.5
Oklahoma <sup>1,8</sup>	638,043	675,113	700,341	772,191	824,855	5.8	3.7	10.3	6.8
Oregon <sup>3,8</sup>	554,586	568,739	589,388	607,414	623,095	2.6	3.6	3.1	2.6
Pennsylvania <sup>3,8</sup>	2,741,310	2,758,784	2,803,819	2,902,243	2,901,339	0.6	1.6	3.5	0.0
Rhode Island <sup>1,6,8</sup>	137,196	149,413	152,227	158,721	157,720	8.9	1.9	4.3	-0.6
South Carolina <sup>3,8</sup>	924,734	918,650	886,000	917,419	891,830	-0.7	-3.6	3.5	-2.8
South Dakota <sup>2,8</sup>	86,118	109,030	119,567	111,184	93,578	26.6	9.7	-7.0	-15.8
Tennessee <sup>1,5,6,8</sup>	861,927	815,935	751,377	783,149	783,903	-5.3	-7.9	4.2	0.1
Texas <sup>1,6,8</sup>	1,596,879	1,419,823	1,425,946	1,538,972	1,595,358	-11.1	0.4	7.9	3.7
Utah <sup>1,5,8</sup>	256,802	261,400	285,395	302,453	295,624	1.8	9.2	6.0	-2.3
Vermont <sup>1,6</sup>	122,028	124,228	119,099	127,665	144,054	1.8	-4.1	7.2	12.8
Virginia <sup>2,5</sup>	851,776	808,701	1,070,668	1,112,443	873,483	-5.1	32.4	3.9	-21.5
Washington <sup>4,8</sup>	1,847,523	1,927,431	1,995,744	2,192,885	2,312,186	4.3	3.5	9.9	5.4
West Virginia <sup>4,6,8</sup>	765,208	433,258	510,806	488,013	490,531	-43.4	17.9	-4.5	0.5
Wisconsin <sup>4,8</sup>	1,170,065	1,043,244	1,094,074	1,154,654	1,113,240	-10.8	4.9	5.5	-3.6
Wyoming <sup>4</sup>	116,537	117,324	126,996	137,135	136,515	0.7	8.2	8.0	-0.5
Non-federal total	\$53,810,800	\$51,849,508	\$52,659,747	\$54,682,373	\$54,786,220	-3.6	1.6	3.8	0.2
Federal <sup>a</sup>	3,258,155	3,270,322	3,339,892	3,423,825	3,542,605	0.4	2.1	2.5	3.5
Federal employees <sup>b</sup>	2,462,059	2,454,861	2,586,700	2,676,370	2,763,885	-0.3	5.4	3.5	3.3
TOTAL	\$57,066,950	\$55,117,823	\$55,997,632	\$58,104,190	\$58,326,816	-3.4	1.6	3.8	0.4

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care

a Includes federal benefits as included in Table 8.

b Included in the Federal benefits total.

1) Deductible data were not available. Deductibles were estimated using the a ratio based on Manual Equivalent premiums.

2) Deductible data were estimated by subtracting the AM Best data from Agency data.

3) Deductible data were given by the Agency

4) Deductibles not allowed

5) Self-insurance data were not available and were imputed. Method is outlined in Appendix E.

6) Self-Insurance data for some years is imputed using previous years' data

7) Estimation methodology may not be same for all the years due to unavailability of the survey response data for some years.

8) Second Injury Fund in the state has been added to the private carriers, state fund and self-insured data according to their share in the total benefits.

Source: National Academy of Social Insurance estimates based on data from state agencies, A.M. Best, National Association of Insurance Commissioners (NAIC), the U.S. Department of Labor and the Social Security Administration.

**Table 8**

**Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2009**  
(in thousands)

State	Private Carriers		State Funds		Self-Insured <sup>b</sup>		Totals <sup>g</sup>	Percent Medical	Medical <sup>c</sup>
	Benefits	Percent Share	Benefits	Percent Share	Benefits	Percent Share			
Alabama	\$297,824	47.6	\$327,930	52.4	\$625,755	67.6	\$423,010		
Alaska	156,254	73.2	57,119	26.8	213,372	66.4	141,679		
Arizona	225,639	34.7	315,649	48.5	650,730	62.1	404,103		
Arkansas	150,642	69.7	65,574	30.3	216,216	65.8	142,270		
California	4,814,138	51.7	1,607,715	17.3	2,895,941	31.1	9,317,794		
Colorado	245,494	27.8	385,554	43.6	884,044	50.2	443,790		
Connecticut	621,327	74.4	213,347	25.6	834,673	43.5	363,083		
Delaware	160,236	77.8	45,736	22.2	205,972	55.1	113,491		
District of Columbia	78,046	84.9	13,894	15.1	91,940	37.5	34,477		
Florida	1,924,139	64.6	1,053,326	35.4	2,977,465	64.4	1,917,488		
Georgia	1,097,153	73.5	395,543	26.5	1,492,696	49.4	737,392		
Hawaii	131,780	53.9	82,023	33.6	244,375	43.0	105,081		
Idaho	85,223	32.0	30,571	12.5	266,461	61.4	163,607		
Illinois	2,256,602	75.7	149,948	56.3	2,979,286	47.9	1,427,078		
Indiana	544,868	89.1	66,924	10.9	611,792	71.1	434,984		
Iowa	434,115	78.0	122,702	22.0	556,817	54.0	300,681		
Kansas	306,423	73.2	112,233	26.8	418,656	59.2	247,844		
Kentucky	387,820	52.6	116,655	15.8	737,392	57.1	421,051		
Louisiana	434,395	51.7	270,075	32.2	839,580	54.2	455,052		
Maine	90,499	34.3	76,762	29.1	263,512	46.2	121,742		
Maryland	463,558	51.7	210,192	23.5	895,905	44.6	399,574		
Massachusetts	748,427	78.7	201,963	21.3	950,390	34.2	325,480		
Michigan	958,184	63.5	551,697	36.5	1,509,881	35.4	533,944		
Minnesota	760,135	70.2	268,439	24.8	1,082,620	52.1	564,005		
Mississippi	184,327	57.9	134,171	42.1	318,499	59.3	188,870		
Missouri	556,200	66.7	193,689	23.2	834,075	54.7	456,239		
Montana	84,905	33.4	41,279	16.2	254,118	56.8	144,339		
Nebraska	236,868	77.9	67,287	22.1	304,156	60.5	184,014		
Nevada	293,133	67.7	139,557	32.3	432,690	46.1	199,470		

New Hampshire	184,713	80.0	46,257	20.0	230,971	61.3	141,585
New Jersey	1,563,464	78.1	439,411	21.9	2,002,875	48.6	973,877
New Mexico	158,641	56.1	87,606	31.0	282,633	59.9	169,297
New York	1,797,434	43.3	1,252,838	30.2	4,146,728	48.0	1,990,429
North Carolina	1,059,199	75.2	349,728	24.8	1,408,926	44.7	629,790
North Dakota <sup>a</sup>			110,526	100.0	110,526	60.5	66,866
Ohio <sup>a</sup>	20,968	0.9	407,086	17.3	2,353,384	42.4	998,833
Oklahoma <sup>a</sup>	369,263	44.8	193,532	23.5	824,855	43.2	356,337
Oregon	237,286	38.1	106,822	17.1	623,095	52.0	324,009
Pennsylvania	1,975,878	68.1	615,246	21.2	2,901,339	46.0	1,333,716
Rhode Island	56,795	36.0	21,069	13.4	157,720	33.4	52,678
South Carolina	651,014	73.0	184,183	20.7	891,830	41.3	368,326
South Dakota	90,019	96.2	3,558	3.8	93,578	65.4	61,200
Tennessee	605,574	77.3	178,329	22.7	783,903	53.9	422,524
Texas	917,000	57.5	329,840	20.7	1,595,358	59.6	950,833
Utah	109,973	37.2	48,975	16.6	295,624	69.1	204,276
Vermont	124,564	86.5	19,490	13.5	144,054	49.4	71,163
Virginia	658,203	75.4	215,280	24.6	873,483	57.9	505,747
Washington <sup>a</sup>	19,007	0.8	537,003	23.2	2,312,186	34.9	807,719
West Virginia <sup>d</sup>	173,769	35.4	45,091	9.2	490,531	36.2	177,581
Wisconsin	956,730	85.9	156,511	14.1	1,113,240	68.8	765,593
Wyoming <sup>a</sup>	1,751	1.3	134,764	98.7	136,515	50.9	69,525
Non-federal total	\$30,459,597	55.6	\$14,206,553	25.9	\$54,784,211	50.9	\$27,900,839
Federal <sup>e</sup>			3,542,605	29.3	2,763,885	31.3	863,729
Federal employees <sup>f</sup>			\$58,326,816	49.6			\$28,940,005
TOTAL							

\*Benefits are payments in the calendar year to injured workers and to providers of their medical care.

a. States with exclusive funds (Ohio, North Dakota, Washington, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL & HW act or employers liability coverage which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

d. West Virginia completed the transition from monopolistic state fund to competitive insurance status on July 1, 2008.

e. Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

f. Included in the Federal benefits total.

g. These data may not include second injury fund for all states and may be an understatement of total payments data.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

**Table 9****Medical, Cash and Total Benefits, by state, 2008-2009<sup>a</sup>**  
(in thousands)

State	2008			2009			2008-2009 Percent Change		
	Medical	Cash	Total	Medical	Cash	Total	Medical	Cash	Total
Alabama	\$451,746	\$204,862	\$656,607	\$423,010	\$202,744	\$625,755	-6.4	-1.0	-4.7
Alaska	131,638	73,725	205,363	141,679	71,693	213,372	7.6	-2.8	3.9
Arizona	470,571	220,429	691,001	404,103	246,627	650,730	-14.1	11.9	-5.8
Arkansas	151,859	81,411	233,270	142,270	73,946	216,216	-6.3	-9.2	-7.3
California	5,155,395	4,311,011	9,466,406	5,065,094	4,252,700	9,317,794	-1.8	-1.4	-1.6
Colorado	457,484	459,317	916,801	443,790	440,254	884,044	-3.0	-4.2	-3.6
Connecticut	345,515	432,672	778,187	363,083	471,590	834,673	5.1	9.0	7.3
Delaware	131,090	87,394	218,484	113,491	92,481	205,972	-13.4	5.8	-5.7
District of Columbia	28,460	51,709	80,168	34,477	57,462	91,940	21.1	11.1	14.7
Florida	1,823,183	1,012,250	2,835,433	1,917,488	1,059,978	2,977,465	5.2	4.7	5.0
Georgia	763,312	813,779	1,577,091	737,392	755,304	1,492,696	-3.4	-7.2	-5.4
Hawaii	106,170	139,593	245,763	105,081	139,294	244,375	-1.0	-0.2	-0.6
Idaho	172,698	108,112	280,810	163,607	102,854	266,461	-5.3	-4.9	-5.1
Illinois	1,414,054	1,507,546	2,921,600	1,427,078	1,552,208	2,979,286	0.9	3.0	2.0
Indiana	444,323	181,484	625,807	434,984	176,808	611,792	-2.1	-2.6	-2.2
Iowa	300,456	254,916	555,372	300,681	256,136	556,817	0.1	0.5	0.3
Kansas	248,747	165,831	414,578	247,844	170,812	418,656	-0.4	3.0	1.0
Kentucky	403,722	298,403	702,125	421,051	316,341	737,392	4.3	6.0	5.0
Louisiana	431,786	423,236	855,021	455,052	384,528	839,580	5.4	-9.1	-1.8
Maine	124,506	139,278	263,784	121,742	141,769	263,512	-2.2	1.8	-0.1
Maryland	420,241	515,707	935,948	399,574	496,332	895,905	-4.9	-3.8	-4.3
Massachusetts	304,150	551,657	855,807	325,480	624,910	950,390	7.0	13.3	11.1
Michigan	509,563	897,719	1,407,282	533,944	975,937	1,509,881	4.8	8.7	7.3
Minnesota	524,330	501,607	1,025,937	564,005	518,615	1,082,620	7.6	3.4	5.5
Mississippi	199,309	136,794	336,103	188,870	129,629	318,499	-5.2	-5.2	-5.2

Missouri	506,674	399,719	906,393	456,239	377,836	834,075	-10.0	-5.5	-8.0
Montana	150,312	103,165	253,477	144,339	109,779	254,118	-4.0	6.4	0.3
Nebraska	201,342	122,359	323,702	184,014	120,141	304,156	-8.6	-1.8	-6.0
Nevada	199,210	231,049	430,260	199,470	233,220	432,690	0.1	0.9	0.6
New Hampshire	148,468	92,943	241,411	141,585	89,386	230,971	-4.6	-3.8	-4.3
New Jersey	940,181	1,011,363	1,951,545	973,877	1,028,997	2,002,875	3.6	1.7	2.6
New Mexico	161,481	109,915	271,396	169,297	113,336	282,633	4.8	3.1	4.1
New York	1,968,209	1,891,024	3,859,233	1,990,429	2,156,298	4,146,728	1.1	14.0	7.4
North Carolina	663,818	791,923	1,455,740	629,790	779,136	1,408,926	-5.1	-1.6	-3.2
North Dakota	61,936	43,901	105,837	66,866	43,660	110,526	8.0	-0.5	4.4
Ohio	1,092,704	1,397,376	2,490,080	998,833	1,354,550	2,353,384	-8.6	-3.1	-5.5
Oklahoma	338,220	433,971	772,191	356,337	468,518	824,855	5.4	8.0	6.8
Oregon	315,248	292,166	607,414	324,009	299,085	623,095	2.8	2.4	2.6
Pennsylvania	1,348,210	1,554,033	2,902,243	1,333,716	1,567,623	2,901,339	-1.1	0.9	0.0
Rhode Island	50,949	107,771	158,721	52,678	105,041	157,720	3.4	-2.5	-0.6
South Carolina	376,142	541,277	917,419	368,326	523,504	891,830	-2.1	-3.3	-2.8
South Dakota	74,493	36,691	111,184	61,200	32,378	93,578	-17.8	-11.8	-15.8
Tennessee	414,286	368,863	783,149	422,524	361,379	783,903	2.0	-2.0	0.1
Texas	941,851	597,121	1,538,972	950,833	644,525	1,595,358	1.0	7.9	3.7
Utah	216,556	85,897	302,453	204,276	91,348	295,624	-5.7	6.3	-2.3
Vermont	67,790	59,875	127,665	71,163	72,891	144,054	5.0	21.7	12.8
Virginia	645,217	467,226	1,112,443	505,747	367,736	873,483	-21.6	-21.3	-21.5
Washington	798,723	1,394,162	2,192,885	807,719	1,504,467	2,312,186	1.1	7.9	5.4
West Virginia	182,713	305,300	488,013	177,581	312,951	490,531	-2.8	2.5	0.5
Wisconsin	849,445	305,210	1,154,654	765,593	347,647	1,113,240	-9.9	13.9	-3.6
Wyoming	71,103	66,031	137,135	69,525	66,990	136,515	-2.2	1.5	-0.5
Non-federal total	28,299,589	26,380,775	54,680,365	27,900,839	26,883,373	54,784,211	-1.4	1.9	0.2

a For more detail on state by state methodologies, see, *Sources and Methods: A Companion to Workers' Compensation: Benefits, Coverage, and Costs, 2009* section of the Academy's website at [www.nasi.org](http://www.nasi.org).

Source: National Academy of Social Insurance estimates based on data from state agencies and A.M. Best.

**Table 10****Workers' Compensation Benefits Per \$100 of Covered Wages, by State, 2005–2009**

	2005	2006	2007	2008	2009	Dollar Amount Change	
						2008-2009	2005-2009
Alabama	\$1.04	\$0.98	\$0.95	\$0.96	\$0.96	\$0.00	-\$0.08
Alaska	1.64	1.58	1.50	1.54	1.56	0.02	-0.08
Arizona	0.62	0.64	0.65	0.65	0.66	0.01	0.04
Arkansas	0.67	0.66	0.65	0.61	0.57	-0.04	-0.10
California	1.58	1.36	1.23	1.21	1.26	0.05	-0.31
Colorado	1.07	0.97	0.88	0.88	0.89	0.01	-0.18
Connecticut	0.84	0.79	0.75	0.80	0.91	0.11	0.07
Delaware	1.17	1.24	1.08	1.11	1.09	-0.01	-0.07
District of Columbia	0.32	0.29	0.26	0.23	0.27	0.04	-0.05
Florida	1.30	1.02	0.99	0.98	1.10	0.12	-0.21
Georgia	0.97	0.91	0.92	0.98	0.98	0.00	0.01
Hawaii	1.24	1.13	1.09	1.06	1.09	0.03	-0.15
Idaho	1.33	1.25	1.25	1.31	1.32	0.01	-0.01
Illinois	0.98	0.94	1.00	1.05	1.14	0.09	0.15
Indiana	0.57	0.55	0.56	0.58	0.61	0.03	0.03
Iowa	1.04	0.99	0.95	1.04	1.07	0.03	0.03
Kansas	0.91	0.85	0.81	0.82	0.86	0.04	-0.06
Kentucky	1.22	1.05	1.02	1.08	1.18	0.09	-0.04
Louisiana	1.18	1.12	1.05	1.15	1.15	0.00	-0.02
Maine	1.51	1.50	1.37	1.26	1.30	0.04	-0.21
Maryland	0.77	0.77	0.75	0.81	0.79	-0.02	0.02
Massachusetts	0.59	0.57	0.51	0.47	0.55	0.08	-0.04
Michigan	0.87	0.86	0.87	0.82	0.96	0.15	0.10
Minnesota	0.90	0.85	0.82	0.85	0.95	0.10	0.06
Mississippi	0.96	0.97	0.96	0.97	0.96	-0.01	-0.01
Missouri	1.00	0.89	0.89	0.89	0.87	-0.03	-0.14
Montana	2.00	1.90	1.83	1.84	1.89	0.06	-0.11
Nebraska	1.09	0.92	0.90	1.00	0.96	-0.05	-0.13
Nevada	0.99	0.84	0.78	0.82	0.91	0.10	-0.08
New Hampshire	0.93	0.84	0.77	0.87	0.87	0.00	-0.06
New Jersey	0.90	0.87	0.88	0.91	0.98	0.07	0.09
New Mexico	1.14	1.08	1.01	0.96	1.03	0.07	-0.11
New York	0.79	0.76	0.68	0.76	0.88	0.12	0.09
North Carolina	1.05	0.93	0.89	0.95	0.98	0.02	-0.07
North Dakota	0.88	0.81	0.86	0.91	0.92	0.02	0.04
Ohio	1.26	1.19	1.20	1.19	1.19	0.00	-0.07
Oklahoma	1.45	1.39	1.35	1.41	1.57	0.16	0.12
Oregon	0.94	0.90	0.89	0.90	0.98	0.08	0.04
Pennsylvania	1.28	1.22	1.18	1.19	1.22	0.03	-0.06
Rhode Island	0.77	0.80	0.79	0.81	0.84	0.03	0.07
South Carolina	1.64	1.54	1.41	1.44	1.47	0.03	-0.17

continued on p.29



**Table 10 continued****Workers' Compensation Benefits Per \$100 of Covered Wages, by State, 2005–2009**

	2005	2006	2007	2008	2009	Dollar Amount Change	
						2008-2009	2005-2009
South Dakota	0.83	0.99	1.01	0.90	0.76	-0.14	-0.06
Tennessee	0.96	0.85	0.75	0.77	0.81	0.05	-0.14
Texas	0.56	0.45	0.42	0.44	0.47	0.03	-0.08
Utah	0.73	0.67	0.66	0.68	0.70	0.01	-0.03
Vermont	1.22	1.19	1.10	1.14	1.33	0.18	0.10
Virginia	0.62	0.56	0.70	0.71	0.57	-0.14	-0.05
Washington	1.70	1.63	1.57	1.69	1.82	0.14	0.12
West Virginia	3.72	1.99	2.25	2.08	2.10	0.02	-1.62
Wisconsin	1.25	1.06	1.07	1.11	1.13	0.01	-0.12
Wyoming	1.44	1.25	1.21	1.20	1.27	0.07	-0.17
Total non-federal	1.07	0.96	0.93	0.95	1.00	0.05	-0.07
Federal Employees	1.50	1.45	1.46	1.46	1.44	-0.02	-0.06
Total	1.09	0.99	0.96	0.98	1.03	0.05	-0.07

Source: National Academy of Social Insurance estimates based on Tables 3, 8, D1, D2, D3 and D4.

*"In 2009, the share of state benefits for medical care ranged from lows of less than 40 percent to highs of over 60 percent."*

- Differences in medical costs, medical practices, and the role of workers' compensation programs in regulating allowable medical costs;
- Differences in prevalence of lump-sum settlements which can obscure the allocation between medical and other benefits;
- Differences in the role of the state agency, statutes, and case law in defining the limits of medical care that must be provided to workers disabled by workplace injuries and diseases; and
- Differences in the industry mix in each state, which influences the types and severity of illnesses and injuries that occur, and thus the level of medical costs.

In 24 states, total benefits (cash plus medical) increased in 2009 (Table 9).<sup>10</sup> Of those a total of six states had increases in medical benefits that exceeded the change in cash benefits. For example, in New Mexico, medical benefits increased by 4.8 percent and cash benefits increased by only 3.1 percent, while in Tennessee, medical benefits increased by 2.0 percent while cash benefits decreased by 2.0 percent. In 12 states with total benefit increases, cash benefits increased more rapidly than medical benefits. In Washington, for example, cash benefits were up 7.9 percent and medical benefits were up 1.1 percent.

Among the 24 jurisdictions where total benefits declined, 13 jurisdictions had medical benefits that declined more rapidly than cash benefits, such as South Dakota, where medical benefits dropped by 17.8 percent while cash benefits dropped by 11.8 percent. However, five states had medical benefits that declined less rapidly than cash benefits, such as Arkansas, where medical benefits were down 6.3 percent and cash benefits were down 9.2 percent. While the long-term national trend has been for medical benefits to grow more rapidly than cash benefits (as

<sup>10</sup> Table 9 includes data for the 50 states plus the District of Columbia, while Table 1 also includes data on Federal programs.

shown in Figure 4), experience varies greatly among states and from year to year.

## State Trends in Benefits Relative to Wages

One way to standardize state benefit payments is to divide each state's total benefits by total wages of covered workers, which takes account of the number of workers and prevailing wage levels in the state. The measure of benefits as a percentage of covered wages helps show whether large growth in a state's benefits payments may be due to growth in the state's population of covered workers and covered payroll or due to other factors. When benefits are standardized relative to covered payroll, the state patterns of change are somewhat different from those revealed by looking only at dollar changes in benefits.

Benefits per \$100 of covered payroll by state in 2005 through 2009 are shown in Table 10. In 15 states benefits relative to covered payroll increased in 2009 even though the total dollar amount of benefits decreased. For example in Arizona, between 2008 and 2009 there was a 5.8 percent decrease in the total benefits but benefits per \$100 of covered wages increase by one cent.

*"Benefits per \$100 of payroll are neither a measure of adequacy for workers nor a measure of costs for employers."*

**Benefits per \$100 of payroll are neither a measure of adequacy for workers nor a measure of costs for employers.** Although benefit payments that are standardized relative to wages in a state provide a useful perspective for looking at changes within particular states over time, the data do not provide meaningful comparisons of the adequacy of benefits across states. By the same token, these data do not show the comparative cost to employers of locating their business in one state versus another. Some reasons why it is inappropriate and misleading to use data on benefits per \$100 of payroll to compare the adequacy of benefits for workers or the costs to employers across states are set out below.

**Caveats on comparing benefit adequacy across states.** As discussed in the Academy's study panel report *Adequacy of Earnings Replacement in Workers' Compensation Programs* (Hunt, 2004), an appropriate study of adequacy compares the benefits disabled workers actually receive with the wages they lose because of their injuries or occupational diseases. Such data are not available for most states. Aggregate benefits relative to aggregate covered wages could be high or low in a given state for a number of reasons unrelated to the adequacy of benefits that injured workers receive.

*First*, states with more workers in high-risk industries—such as mining or construction—may pay more benefits simply because they have a higher proportion of injured workers and more workers with serious, permanent disabilities that occurred on the job, which resulted in high earnings losses.

*Second*, states differ considerably in their compensability rules—that is, the criteria they use for determining whether an injury is work-related and therefore will be paid by the workers' compensation program. A state with a relatively lenient compensability threshold might pay more cases, and therefore have higher aggregate benefits relative to the total number of workers in the state, yet pay below average benefits to workers with serious injuries.

*Third*, injured workers may have their benefits reduced by litigation costs for which they are responsible. The amount of these costs will vary from state to state depending on the state's level of litigation, the magnitude of these costs, and the proportion of the legal fees for which the worker is responsible.

*Fourth*, in some states, features of the workers' compensation system, employer programs, or labor relations conditions may lead to more effective returns to productive employment for injured workers.

Other things equal, a state with better return to work results will have more adequate benefits than another state that pays the same benefits per injured worker because the re-employed workers will experience less loss of earnings due to their workplace injuries. Also, adequacy across different claimants can be vastly different within any state, i.e., some classes of injured workers may get much better wage replacement than others. Particularly, class groups that tend



to do worse than others are younger workers with permanent injuries and highly paid workers (because they often hit TTD weekly limits). Even if average compensation levels for permanent injuries are relatively good, inequities can be substantial because the same injury can have drastically different vocational effects on different workers, e.g. a shoulder injury for a carpenter vs. a bookkeeper.

**Caveats on using benefits data to compare employer costs across states.** These data are benefits paid to workers, not employer costs. An employer's costs for workers' compensation in different states are best compared by knowing the premiums that comparable employers are charged in each state (Thomason, Schmidle, and Burton, 2001). These premiums are affected by the employer's insurance classification and its own experience with past injury rates and the severity of injuries its workers sustained. Data on average benefits per worker or data on paid benefits relative to total wages in the state do not provide information appropriate for determining the employers' costs of workers' compensation in a state for the following reasons.

*First*, a company in a high-risk industry would not necessarily experience lower costs if it moved to a state with predominantly low-risk industries, since the migrating company would still be in the high risk insurance classification.

*Second*, changes in state statutes would affect new employers, but these changes are not fully reflected in our data on benefits relative to wages. Premiums charged to employers in a given year are based on the costs of injuries it is expected to incur in that year under policies in effect that year. If a state had changed its statutes either to lower future benefits or to make future benefits more adequate, those policies would not be fully reflected in benefits currently being paid to workers in that state as shown in Table 10. For example, a state that tightened its rules would be expected to have lower future costs for new employers, yet it would not immediately show lower benefits per worker because it would continue to pay workers who were permanently disabled in the past under the old rules.

*Third*, employers' costs for workers' compensation nationally exceed the benefits paid to workers because of factors such as administrative costs and

profits (or losses) of private carriers. However, the relationship of employers' costs relative to workers' benefits varies among states because of various factors, such as the extent of competition in the workers' compensation insurance market and the administrative complexity of different state systems. Litigation rates are a prime example of how employer costs can vary greatly, even with similar benefit payouts. Other examples are employer obligations for reporting to the state and assessments for state funds and agency operating costs.

In brief, state-level benefits paid per worker or relative to total wages in the state are a way to standardize aggregate benefit payments between large and small states. However, much more refined data and analyses are needed to assess the adequacy of benefits that individual workers receive or the costs that particular employers would incur in different states.

## Employer Costs

Employer costs for workers' compensation in 2009 were \$73.9 billion, a decrease of 7.6 percent from \$79.9 billion in 2008 (Table 11). Relative to total wages of covered workers, employer costs decreased by four cents to \$1.30 per \$100 of covered wages in 2009 from \$1.34 per \$100 of covered wages in 2008 (Table 12).

*"For insured benefits, employer costs are largely determined by premiums paid in the year."*

For self-insured employers, the costs include benefit payments made during the calendar year and the administrative costs associated with providing those benefits. Because self-insured employers generally do not separately record administrative costs for workers' compensation, their administrative costs must be estimated. The costs are assumed to be the same share of benefits as are administrative costs reported by private insurers to the National Association of Insurance Commissioners. These administrative costs include expenses for direct defense and cost containment, taxes, licenses, and fees. For more information on the self-insurance costs estimates, see Appendix C. For the federal

employee program, employer costs are benefits paid plus administrative costs (U.S. DOL, 2011). For employers who purchase insurance from private carriers and state funds, costs consist of premiums written in the calendar year plus benefit payments made under deductible provisions. The growing use of large deductible policies complicates the measurement of benefits and costs. As mentioned before, under deductible policies, the insurer pays all of the workers' compensation insured benefits, but employers are responsible for reimbursing the insurers for those benefits up to a specified deductible amount. In return for accepting a policy with a deductible, the employer pays a lower premium. Our insurance industry sources of data do not provide information on deductibles, and many states lack data on deductible payments. Consequently, these benefits had to be estimated, as described in Appendix G.

Using these estimates, costs for employers insuring through private carriers were \$42.2 billion in 2009, or approximately 57.2 percent of total costs. Self-insurers accounted for 22.4 percent of total employer costs, state funds represented 14.9 percent of costs, and federal programs were 5.5 percent (Table 11).

## Alternative Measures of Employers' Costs

The National Academy of Social Insurance has published estimates of the employers' costs of workers' compensation as a percent of covered payroll that are comparable across years for the period from 1980 to 2009. These data are presented in Table 12 and are reproduced in column 2 of Table 13.

The Bureau of Labor Statistics (BLS) publishes *Employer Costs for Employee Compensation*, which contains information on wages and salaries and employee benefits provided by employers, including workers' compensation. Data on private sector employers are available since 1986 and data on all non-federal employees are available since 1991.<sup>11</sup>

These data are provided in columns 3 and 4 of Table 13.

Figure 5 presents the national BLS data on employers' costs for the private sector and for all non-federal employees as well as the NASI data on employers' costs for all employees. There are similarities and differences between the NASI and BLS data, as discussed in Burton (2011). One difference is that, except for 1986, the costs are higher in the BLS data than in the NASI data. There are also differences in the peak and trough years of the BLS data and the NASI data. For example, the BLS data increased from 2001 until 2005 and then declined through 2009, while the NASI data increased from 2000 to 2004 and then declined from 2006 until 2009. Despite these differences, the NASI and BLS data agree in general patterns during the last three decades: employers costs increased from the mid-1980s to the early 1990s, then declined rapidly until the late 1990s or early 2000s, then increased for a few years before dropping again during much of the current decade.

## Trends in Benefits and Employer Costs

Table 12 and Figure 1 show the trend in benefits paid and employer costs per \$100 of covered wages between 1980 and 2009. Since 2005, workers' compensation benefits and employers' cost relative to covered wages have been on the decline and continued to fall in 2009. Nationally, employer costs of \$1.30 per \$100 of covered wages in 2009 were at the lowest point since 1980, which is the earliest date when comparable data are available. Benefits per \$100 of payroll were \$1.03 in 2009, up from \$0.98 per \$100 of payroll in 2008. Benefits paid in 2009 per \$1 of employer cost were \$0.79, an increase of six cents from 2008.

What accounts for the difference between benefits paid to workers and costs to employers? For self-insured employers (or the federal employee

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11 The BLS data are available on a quarterly basis. The most recent data used for Table 13 are based on a sample of 13,600 establishments in private industry and 1,900 establishments in state and local governments (U.S. Department of Labor, 2009g). The BLS data on employer costs in the private sector are available by industry, occupational group, establishment size, bargaining status, and for four census regions and nine census divisions, but are not available for individual states. The BLS methodology and the procedure used to calculate workers' compensation benefits per \$100 of payroll are discussed in Burton (2011: Appendix A).

**Table 11****Employer Costs for Workers' Compensation by Type of Insurer, 1987–2009  
(in millions)**

Year	Total	%	Private Carriers		State Funds		Federal <sup>a</sup>		Self-Insurance	
			Total	% of total	Total	% of total	Total	% of total	Total	% of total
1987	\$38,095	*	\$25,448	66.8	\$5,515	14.5	\$1,728	4.5	\$5,404	14.2
1988	43,284	13.6	28,538	65.9	6,660	15.4	1,911	4.4	6,175	14.3
1989	47,955	10.8	31,853	66.4	7,231	15.1	1,956	4.1	6,915	14.4
1990	53,123	10.8	35,054	66.0	8,003	15.1	2,156	4.1	7,910	14.9
1991	55,216	3.9	35,713	64.7	8,698	15.8	2,128	3.9	8,677	15.7
1992	57,395	3.9	34,539	60.2	9,608	16.7	2,454	4.3	10,794	18.8
1993	60,819	6.0	35,596	58.5	10,902	17.9	2,530	4.2	11,791	19.4
1994	60,517	-0.5	33,997	56.2	11,235	18.6	2,490	4.1	12,795	21.1
1995	57,089	-5.7	31,554	55.3	10,512	18.4	2,556	4.5	12,467	21.8
1996	55,293	-3.1	30,453	55.1	10,190	18.4	2,601	4.7	12,049	21.8
1997	53,544	-3.2	29,862	55.8	8,021	15.0	3,358	6.3	12,303	23.0
1998	53,431	-0.2	30,377	56.9	7,926	14.8	3,471	6.5	11,657	21.8
1999	55,835	4.5	33,422	59.9	7,484	13.4	3,496	6.3	11,433	20.5
2000	60,065	7.6	35,673	59.4	8,823	14.7	3,620	6.0	11,949	19.9
2001	65,752	9.5	37,768	57.4	10,644	16.2	3,778	5.7	13,561	20.6
2002	72,574	10.4	41,295	56.9	13,695	18.9	3,898	5.4	13,686	18.9
2003	80,544	11.0	45,276	56.2	16,402	20.4	3,970	4.9	14,897	18.5
2004	84,232	4.6	47,411	56.3	17,510	20.8	4,073	4.8	15,237	18.1
2005	89,272	6.0	50,668	56.8	18,157	20.3	4,096	4.6	16,351	18.3
2006	87,213	-2.3	51,437	59.0	15,745	18.1	4,138	4.7	15,893	18.2
2007	85,487	-2.0	51,216	59.9	13,736	16.1	4,236	5.0	16,299	19.1
2008	79,930	-6.5	46,569	58.3	12,619	15.8	4,341	5.4	16,401	20.5
2009	73,882	-7.6	42,241	57.2	11,041	14.9	4,065	5.5	16,535	22.4

(a) In all years, federal costs include those paid under the Federal Employees' Compensation Act for civilian employees and the portion of the Black Lung benefit program that is financed by employers and are paid through the federal Black Lung Disability Trust Fund, including interest and bond payments on past Trust Fund advances from the U.S. Treasury. In years before 1997, federal costs also include the other part of the Black Lung program that is financed solely by federal funds. In 1997–2009, federal costs also include a portion of employer-financed benefits under the Longshore and Harbor Workers Compensation Act that are not reflected in state data—namely, costs paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Source: National Academy of Social Insurance estimates of costs for private carriers and state funds are based on information from A.M. Best and direct contact with state agencies. Costs for federal programs are from the Department of Labor and the Social Security Administration. Self-insured administrative costs are based on information from the National Association of Insurance Commissioners.

program), the difference reflects our estimates of administrative costs (or actual reported costs in the case of the federal program). For these employers,

the costs in a calendar year pertain to benefits paid in the same year.

**Table 12****Workers' Compensation Benefit\* and Cost\*\* Ratios, 1980–2009**

Year	Employer Costs per \$100 of Wages	Benefits per \$100 of Wages	Benefits per \$1 in Employer Cost	Medical Benefits per \$100 of Wages	Cash Benefits per \$100 of Wages
1980	\$1.76	\$0.96	\$0.54	\$0.28	\$0.68
1981	1.67	0.97	0.58	0.29	0.68
1982	1.58	1.04	0.66	0.34	0.70
1983	1.50	1.05	0.70	0.34	0.71
1984	1.49	1.09	0.73	0.36	0.73
1985	1.64	1.17	0.71	0.39	0.78
1986	1.79	1.23	0.69	0.43	0.80
1987	1.86	1.29	0.69	0.47	0.82
1988	1.94	1.34	0.69	0.50	0.84
1989	2.04	1.46	0.72	0.57	0.89
1990	2.18	1.57	0.72	0.62	0.94
1991	2.16	1.65	0.76	0.66	0.99
1992	2.13	1.65	0.78	0.69	0.96
1993	2.17	1.53	0.71	0.66	0.87
1994	2.05	1.47	0.72	0.58	0.89
1995	1.83	1.35	0.74	0.54	0.81
1996	1.66	1.26	0.76	0.50	0.76
1997	1.49	1.17	0.78	0.48	0.68
1998	1.38	1.13	0.82	0.48	0.65
1999	1.35	1.12	0.83	0.48	0.63
2000	1.34	1.06	0.79	0.47	0.60
2001	1.43	1.10	0.77	0.50	0.60
2002	1.57	1.13	0.72	0.52	0.61
2003	1.71	1.16	0.68	0.55	0.61
2004	1.70	1.13	0.67	0.53	0.61
2005	1.71	1.09	0.64	0.51	0.59
2006	1.57	0.99	0.63	0.47	0.52
2007	1.46	0.96	0.66	0.46	0.49
2008	1.34	0.98	0.73	0.49	0.48
2009	1.30	1.03	0.79	0.51	0.52

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

\*\* Costs are employer expenditures in the calendar year for workers' compensation benefits, administrative costs, and/or insurance premiums. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

Source: National Academy of Social Insurance estimates based on Tables 2, 4, and 11.

**Table 13****Workers' Compensation Cost Per \$100 of Payroll: Comparison of NASI and BLS Estimates, 1980-2009**

Year (1)	Employer Costs per \$100 of Payroll (NASI) (2)	Costs for Employers in Private Sector per \$100 of Payroll (BLS) (3)	Costs for All Non-Federal Employees per \$100 of Payroll (BLS) (4)
1980	\$1.76	\$	\$
1981	1.67	–	–
1982	1.58	–	–
1983	1.50	–	–
1984	1.49	–	–
1985	1.64	–	–
1986	1.79	1.74	–
1987	1.86	1.90	–
1988	1.94	2.12	–
1989	2.04	2.30	–
1990	2.18	2.53	–
1991	2.16	2.63	2.41
1992	2.13	2.76	2.52
1993	2.17	2.90	2.66
1994	2.05	2.99	2.67
1995	1.83	2.82	2.60
1996	1.66	2.82	2.52
1997	1.49	2.65	2.44
1998	1.38	2.37	2.17
1999	1.35	2.30	2.11
2000	1.34	2.02	1.90
2001	1.43	1.92	1.87
2002	1.57	2.05	1.93
2003	1.71	2.05	1.93
2004	1.70	2.45	2.26
2005	1.71	2.47	2.31
2006	1.57	2.36	2.21
2007	1.46	2.28	2.15
2008	1.34	2.13	2.03
2009	1.30	2.03	1.92

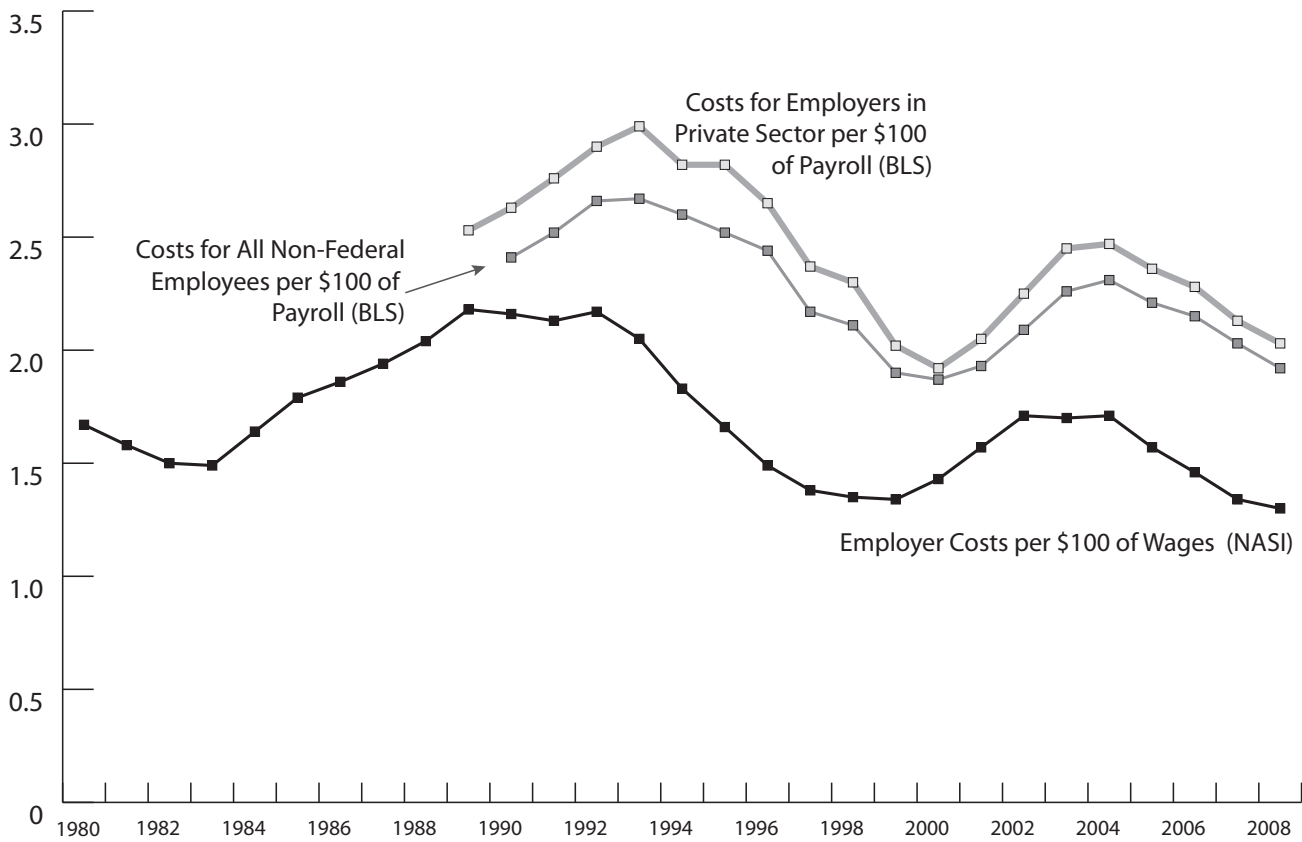
Source: Burton 2011

For insured benefits, employer costs are largely determined by premiums paid in the year. Premiums paid by employers do not necessarily match benefits received by workers in a given year for a number of

reasons. First, premiums in a calendar year must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

**Figure 5**

**Workers' Compensation Costs per \$100 of Payroll 1980-2009  
Comparison of NASI and BLS Estimates**



Source: National Academy of Social Insurance estimates and Burton 2011.

Thus, the premiums for 2009 include benefit payments during the year for 2009 injuries, plus reserves for payment of benefits for the 2009 injuries in 2010 and after. In addition, premiums must cover expenses such as administrative and loss adjustment costs, taxes, profits or losses of insurance carriers, and contributions for special funds, which can include the support of workers' compensation agencies.

From the insurer's perspective, the premiums reflect all future costs the insurer expects to incur for injuries that occur in the policy year. Thus, an increase in expected liabilities could lead to an increase in premiums and a decline in expected liabilities could lead to a decline in premiums.

Second, premiums can be influenced by insurers' past and anticipated investment returns on reserves that they set aside to cover future liabilities. Thus, a decline in investment returns could contribute to an increase in premiums, while an improvement in investment returns could lead to a decline in premiums. Finally, premiums reflect insurers' profits (or losses), since profitability (or lack thereof) will affect the extent of dividends, schedule ratings, and deviations offered by the insurers. Burton (2010) indicated that "the underwriting results for the workers' compensation insurance industry declined in 2009 but remained profitable for the seventh year in a row according to results from A.M. Best."



# Work Injuries, Occupational Illness and Fatalities

National data are not available on the number of persons who file workers' compensation claims or receive benefits in a given year, but trends can be seen in related data series: 1) the Bureau of Labor Statistics collects information about work-related fatalities from a census and data on nonfatal work injuries or occupational illnesses from a sample survey of employers and 2) the National Council on Compensation Insurance (NCCI) has information on workers' compensation claims insured by private carriers and some competitive state funds in forty-one states (NCCI, 2010).

## Fatalities at Work

According to BLS data, a total of 4,551 fatal work injuries occurred in 2009 (Table 14), which is a 12.7 percent decrease from the number reported in 2008, and the lowest number since this data series began in 1992. Transportation incidents continued to be the leading cause of on-the-job fatalities in 2009, accounting for 39 percent of the total. Assaults and violent acts (homicides and self-inflicted injuries), contact with objects and equipment, and falls were the other leading causes of death, accounting for 18 percent, 16 percent, and 14 percent respectively (U.S. DOL, 2010b).

## Nonfatal Injuries and Illnesses

*"The frequency of reported non-fatal occupational injuries and illnesses (incidence rates) has declined every year since 1992."*

The Bureau of Labor Statistics reports a total of 3.3 million nonfatal workplace injuries and illnesses in private industry workplaces during 2009, resulting in a rate of 3.6 cases per one hundred full-time equivalent workers (U.S. DOL, 2010d). Many of these cases involved relatively minor injuries that did not result in lost workdays. The frequency of reported non-fatal occupational injuries and illnesses (inci-

**Table 14**  
Number of Fatal Occupational Injuries,  
1992–2009

Year	Number of Fatalities
1992	6,217
1993	6,331
1994	6,632
1995	6,275
1996	6,202
1997	6,238
1998	6,055
1999	6,054
2000	5,920
2001	8,801
September 11 events	2,886
Other	5,915
2002	5,534
2003	5,575
2004	5,764
2005	5,734
2006	5,840
2007	5,657
2008	5,214
2009	4,551

Source: U.S. DOL 2010b

dence rates) has declined every year since 1992 (Table 15).

A total of 1.0 million workplace injuries or illnesses that required recuperation away from work beyond the day of the incident were reported in private industry in 2009 (U.S. DOL, 2010c). The rate of such reported injuries or illnesses per one hundred full-time workers declined from 3.0 in 1992 to 1.1 in 2009 (Table 15). Some of the most common workplace injuries and illnesses are: sprains and strains (41.8 percent); soreness, pain including back (11.3 percent) bruises and contusions (8.7 percent); fractures (8.3 percent); cuts and lacerations (8.1 percent); heat burns (1.4 percent); carpal tunnel syndrome (0.9 percent); and tendinitis, chemical

**Table 15****Private Industry Occupational Injuries and Illnesses: Total Non-fatal Cases and Incidence Rates, 1987–2009**

Year <sup>a</sup>	Number of Cases (in millions)			Incidence Rate <sup>b</sup>		
	All Cases	Cases with Any Days Away from Work	Cases with Job Transfer or Restriction	All Cases	Cases with Any Days Away from Work	Cases with Job Transfer or Restriction
1987	6.0	2.5	n/a	8.3	3.4	0.4
1988	6.4	2.6	n/a	8.6	3.5	0.5
1989	6.6	2.6	n/a	8.6	3.4	0.6
1990	6.8	2.6	n/a	8.8	3.4	0.7
1991	6.3	2.6	n/a	8.4	3.2	0.7
1992	6.8	2.3	0.6	8.9	3.0	0.9
1993	6.7	2.3	0.7	8.5	2.9	0.9
1994	6.8	2.2	0.8	8.4	2.8	1.0
1995	6.6	2.0	0.9	8.1	2.5	1.1
1996	6.2	1.9	1.0	7.4	2.2	1.1
1997	6.1	1.8	1.0	7.1	2.1	1.2
1998	5.9	1.7	1.1	6.7	2.0	1.1
1999	5.7	1.7	1.0	6.3	1.9	1.1
2000	5.7	1.7	1.1	6.1	1.8	1.2
2001	5.2	1.5	1.0	5.7	1.7	1.1
2002 <sup>c</sup>	4.7	1.4	1.0	5.3	1.6	1.2
2003	4.4	1.3	1.0	5.0	1.5	1.1
2004	4.3	1.3	1.0	4.8	1.4	1.1
2005	4.2	1.2	1.0	4.6	1.4	1.0
2006	4.1	1.2	0.9	4.4	1.3	1.0
2007	4.0	1.2	0.9	4.2	1.2	0.9
2008	4.0	1.2	0.9	4.2	1.2	0.9
2009	3.3	1.0	0.7	3.6	1.1	0.8

n/a - not available

a Data after 1991 exclude fatal work-related injuries and illnesses.

b The incidence rate is the number of cases per one hundred full-time workers.

c Data for 2002 and beyond are not strictly comparable to prior year data due to changes in OSHA recordkeeping requirements.

Source: U.S. DOL 2010c.

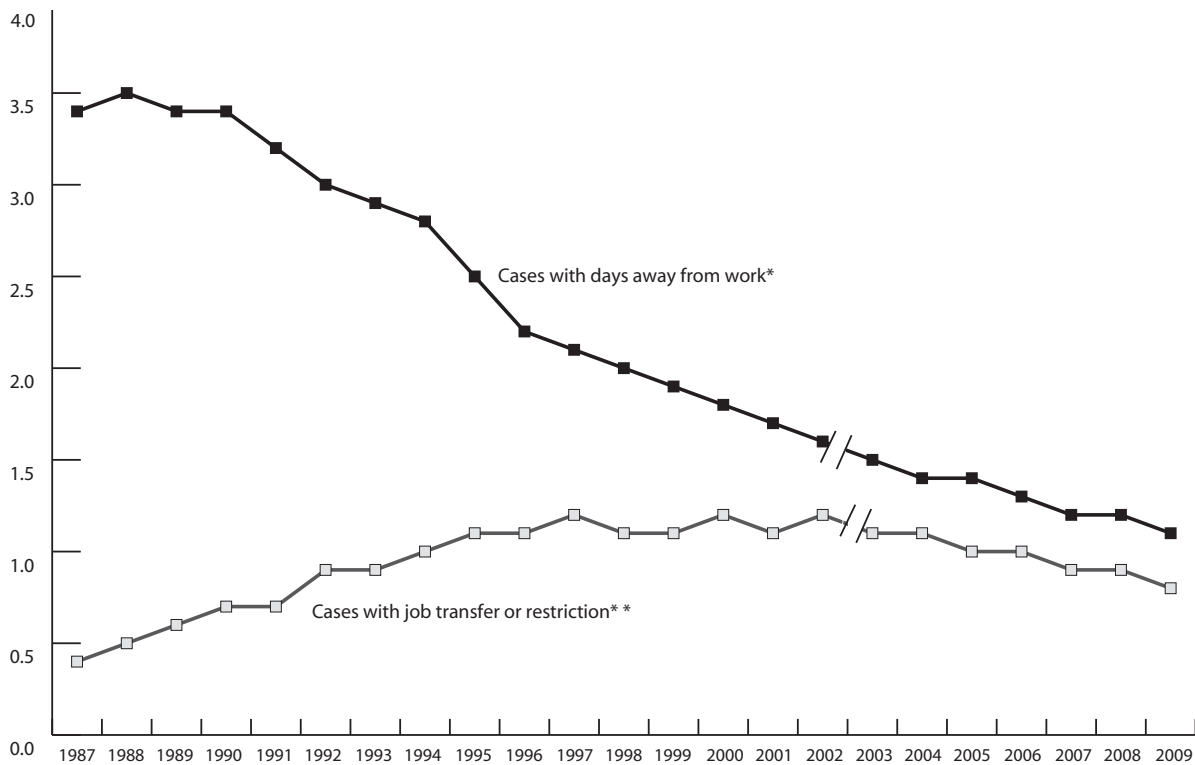
burns and amputations (1.5 percent) (U.S. DOL, 2010c).

Figure 6 shows the trend in private industry incidence rates of occupational injuries and illnesses involving (a) job transfers or restrictions or (b) days away from work. The break in the graph in 2002 shows the change in OSHA record keeping require-

ments, indicating that the data after 2002 may not be strictly comparable. The graph shows a declining trend in the rate of days away from work since 1990. The rate of injuries and illnesses resulting in job transfer or restrictions first increased after 1990 and then declined so that the rate in 2009 was almost the same as in 1990.

**Figure 6**

**Private Industry Occupational Injuries and Illnesses: Incidence Rates 1987–2009**



Note: The break in the graph indicates that the data for 2002 and beyond are not strictly comparable to prior year data due to changes in OSHA recordkeeping requirements.

\* Cases involving days away from work are cases requiring at least one day away from work with or without days of job transfer or restriction.

\*\* Job transfer or restriction cases occur when, as a result of a work-related injury or illness, an employer or health care professional keeps, or recommends keeping an employee from doing the routine functions of his or her job or from working the full workday that the employee would have been scheduled to work before the injury or illness occurred.

Source: Bureau of Labor Statistics.

## Insured Workers' Compensation Claims

NCCI reports on the frequency of workers' compensation claims for privately insured employers and some state funds in forty-one states (Table 16). These data show declining trends similar to national trends in workplace injuries reported by the Bureau of Labor Statistics. Temporary total disability claims are those in which days away from work exceeded the three-to-seven-day waiting period. The frequency of these claims per 100,000 insured workers declined by 52 percent between 1992 and

2006. This decline is very similar to the decline in injuries reported by the BLS that involved days away from work. Between 1992 and 2006, the incidence of injuries that involved days away from work declined by about 57 percent (from 3.0 per one hundred fulltime workers in 1992 to 1.3 per one hundred fulltime workers in 2006) (Table 15). The frequency of total workers' compensation claims—including medical-only cases that involve little or no lost work time—declined by about 47 percent between 1992 and 2006. This rate of decline is similar to the 50.6 percent decline in the incidence rate for all injuries reported to the BLS in

**Table 16**

**Number of Workers' Compensation Claims per 100,000 Insured Workers:  
Private Carriers in Forty-One Jurisdictions, 1992-2006**

Policy Period	Temporary Total	Permanent Partial	Total (including medical only)
1992	1,358	694	8,504
1993	1,331	644	8,279
1994	1,300	565	7,875
1995	1,217	459	7,377
1996	1,124	419	6,837
1997	1,070	414	6,725
1998	977	452	6,474
1999	927	461	6,446
2000	870	437	6,003
2001	799	423	5,510
2002	770	422	5,239
2003	745	414	5,064
2004	709	393	4,884
2005	680	386	4,732
2006	653	384	4,542
<b>Percent decline, 1992–2005</b>	-51.9	-44.7	-46.6

Source: Exhibit XII, Annual Statistical Bulletin, NCCI 1996-2010.

the same period (from 8.9 to 4.4 per one hundred full-time workers between 1992 and 2006).<sup>12</sup>

### Reports of Injuries and Workers' Compensation Claims

Studies during the past several decades have consistently concluded that various systems — including the BLS Survey of Occupational Injuries and Illnesses and state workers' compensation programs — undercount both workplace injuries and illnesses. Hensler et al. (1991) report that 60 percent of those with work-related injuries involving medical care or lost work time received workers'

*“Studies during the past several decades have consistently concluded that various systems — including the BLS Survey of Occupational Injuries and Illnesses and state workers' compensation programs— undercount both workplace injuries and illnesses.”*

12 The similarity between the national rates of decline in the BLS injury rates and the NCCI claims rates may be misleading. Guo and Burton (2010) examined the determinants of the amounts of incurred cash benefits per 100,000 workers in 45 states plus the District of Columbia, which is a variable constructed from NCCI data. Between 1990 and 1999, the national average of incurred benefits per 100,000 workers declined by 41.6 percent in constant dollars. However, there were substantial variations among these 46 jurisdictions in the changes in incurred benefits during this period. The authors found that 21 percent of the drop in benefits during the 1990s could be explained by declines in the BLS injury rates in these jurisdictions, but that over 30 percent of the decline in benefits was due to the changes in many states in workers' compensation compensability rules and administrative practices.

compensation benefits. A study by Lakdawalla and Reville (2005) based on the National Longitudinal Survey of Youth indicates that 55 percent of reported occupational injuries result in workers' compensation claims. Smith et al. (2005) used National Health Interview Survey (NHIS) data and derived injury rates for private industry that are 1.4 times the BLS estimates. Using data from the 2002 Washington State Behavioral Risk Factor Surveillance System survey, Fan et al. (2006) estimate that only 52 percent of injured workers filed a workers' compensation claim. In another recent study, Rosenman et al. (2006) conclude that BLS and workers' compensation data account respectively for 32 percent and 66 percent of workplace injuries and illnesses in Michigan. Boden and Ozonoff (2008) studied six other states. Their upper-bound estimates suggest that the BLS captures between 51 percent and 76 percent of lost-time injuries in these states, while workers' compensation captures 65 percent to 93 percent. Less conservative estimates suggest ranges of 37 percent to 71 percent and 52 percent to 85 percent respectively.

Further studies are underway to assess the accuracy of BLS data and to help understand whether certain injuries or illnesses are more likely to be underreported. The BLS conducted a quality assurance study and verified that its Survey of Occupational Injuries and Illnesses accurately reflected the information reported by employers on logs required under federal Occupational Safety and Health Administration (OSHA) rules. But the survey can still be biased or incomplete if the employer reports have the same bias. For example, employers may not record cases that are in dispute. Also, long-latency occupational diseases and cases of unknown or disputed etiology may not find their way into OSHA logs. Further, there may be some scope differences between the cases that appear in workers' compensation and those that appear on OSHA logs. Generally for a workers' compensation claim there is a waiting period for three or more days before a totally or partially disabled injured worker receives indemnity benefit, hence appear in a workers' compensation claims database. However if an employee has *any* days away from work at the start of injury, it is recorded in an OSHA log as a 'days away from work' case. At the same time, some workers' compensation claims do not include any days away from work but only a day of partial disability when an injured worker receives work restrictions with lesser pay thus not including

enough days away from work to be classified as a 'days away from work' case in the OSHA log (Messiou and Zaidman, 2005).

*"Workers normally cannot sue their employer for workplace injuries because of the exclusive remedy doctrine and, if discharged, normally cannot bring a tort suit against their employers."*

Azaroff et al. (2002) provide a review of many studies of injury reporting and a discussion of reasons for underreporting. Workers may not report compensable injuries because, for example, they do not know that they are covered by workers' compensation, or they believe that obtaining benefits can be difficult and stressful (Strunin and Boden 2004), or they think that benefits are not worth the risks of filing (Fricker 1999). Workers may also not report workplace injuries or file for workers' compensation benefits because they fear employer retaliation (Pransky et al. 1999). Workers normally cannot sue their employer for workplace injuries because of the exclusive remedy doctrine and, if discharged, normally cannot bring a tort suit against their employers because of the employment-at-will doctrine. However, a number of states have statutes protecting workers against retaliation for filing a workers' compensation claim, and courts in many states now allow tort suits for wrongful discharge in violation of public policy, such as exercising a statutory right, of which the classic example is filing a claim for workers' compensation benefits (Willborn et al, 2007).

For injuries and illnesses that take time to develop, like carpal tunnel syndrome and silicosis, the worker may not be aware of the workplace connection, and therefore will not report that work was a cause of the condition. Studies have typically shown much less reporting for such conditions than is suggested in medical data (Stanbury et al, 1995; Biddle et al, 1998; Morse et al, 1998; Milton et al, 1998). Low-wage and temporary workers may be least likely to file for these reasons (Shannon and Lowe, 2002). The primary impact of such restrictions is likely to be on workers' compensation claims. However, fewer cases entered into the workers' compensation system

could also result in fewer injuries reported to the BLS. Boden and Ruser (2003) found that between 7.0 and 9.4 percent of the decline in injury rates measured by BLS between 1991 and 1997 is an indirect result of tighter eligibility standards and claims filing restrictions for workers' compensation benefits.<sup>13</sup>

## Comparing Workers' Compensation with Other Disability Benefit Programs

Other sources of support for disabled workers include sick leave; short-term and long-term disability benefits; Social Security disability insurance; and Medicare. Unlike workers' compensation, these programs are not limited to injuries or illnesses caused on the job. However, some of these programs are not available to workers receiving workers' compensation benefits or the benefits provided by these programs are reduced for workers receiving workers' compensation benefits.

### Other Disability Benefits

Three types of benefits for short-term disability are available to at least some workers. First, sick leave is a common form of wage replacement for short-term absences from work due to illness or injury. Benefits pay 100 percent of wages for a few weeks. Second, state laws require short to medium-term disability insurance in five states: California, Hawaii, New Jersey, New York, and Rhode Island. Most programs pay benefits for twenty-six weeks except California which pays benefits up to fifty-two weeks. The methods used for providing coverage vary depending on the state. In California and Rhode Island, the benefits are financed solely by employee contributions. In Hawaii, New Jersey, and New York, employers also contribute. In order to limit benefits, a worker must have a specified amount of past employment or earnings to qualify for benefits. Benefits typically replace close to or little more than half of the worker's prior earnings. Weekly benefits

are related to a claimant's earnings while in covered employment. A third type of benefit available to some workers is short-term disability insurance that is offered by some employers. Both employers and employees may be required to contribute to the cost of the short-term disability insurance (EBRI, 2009). About 39 percent of private sector employees were covered by short-term disability insurance in 2009 (U.S. DOL, 2010a). In general, workers receiving workers' compensation benefits are not eligible for these other types of short-term disability benefits. There are also other state and municipal disability benefit programs for public employees and particularly for uniformed employees which coordinate with workers' compensation programs and in some cases are an alternative to workers' compensation.

Long-term disability insurance that is financed, at least in part, by employers covers about 33 percent of private sector employees. Such coverage is most common among management, professional, and related workers. About 58 percent of management and professional-related employees, 32 percent of workers in sales and office, and 12 percent of service workers had this coverage as of March 2010 (U.S. DOL, 2010a). Long-term disability insurance benefits are usually paid after a waiting period of three to six months, or after short-term disability benefits end. Long-term disability insurance is generally designed to replace 60 percent of earnings, although replacement rates of between 50 percent and 66 percent are also common. Almost all long-term disability insurance is coordinated with Social Security disability insurance benefits and workers' compensation benefits. That is, the private long-term disability benefits are reduced dollar for dollar by the social insurance benefits. For example, if Social Security benefits replaced 40 percent of the worker's prior earnings, the long-term disability benefit would pay the balance to achieve a 60 percent replacement. Long-term disability insurance is also sold in individual policies, typically to high-earning professionals. Such individual policies are not included in these data. Retirement benefits may also be available to workers who become disabled. Most defined benefit pension plans have some disability provision; benefits

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13 A recent report by the Government Accounting Office (GAO, 2009) on underreporting of injuries recommended interviewing workers during audits, minimizing the time between the date of recording of injuries and the date they are audited, updating the list of hazardous industries regularly, and educating and training employers on recordkeeping requirements to reduce underreporting.



may be available at the time of disability or may continue to accrue until retirement age. Defined contribution pension plans will often make funds in the employee's account available to a disabled worker without penalty, but do not have the insurance features of defined benefit pensions or disability insurance. In addition, Supplemental Security Income and Medicaid provide cash and medical assistance to disabled individuals who have low incomes. These means-tested benefits are based on need rather than work experience and are not covered in this report.

## Social Security Disability Insurance and Medicare

*"...aggregate workers' compensation cash benefits were about a quarter of the total amount of Social Security disability benefits, and workers' compensation medical benefits were just over half of the total amount paid by Medicare."*

Workers' compensation is surpassed in size only by the federal Social Security Disability Insurance program and the accompanying Medicare program in providing cash and medical benefits to disabled workers. While Social Security disability benefits and workers' compensation are the nation's two largest work-based disability benefit programs, the two programs differ in many respects. Workers are eligible for workers' compensation benefits from their first day of employment, while Social Security disability benefits require workers to have a substantial work history. Workers' compensation provides benefits for both short-term and long-term disabilities, and for partial as well as total disabilities. However, workers' compensation benefits cover only those disabilities arising out of and in the course of employment. Social Security disability benefits are paid only to workers who have long-term impairments that preclude any gainful work. Social Security disability benefits are provided whether the disability arose on or off the job. By law, the benefits are paid only to workers who are unable to engage in any substantial gainful activity by reason of a medically determinable

physical or mental impairment that is expected to last a year or result in death. Social Security disability benefits begin after a five month waiting period. Medicare coverage begins for those on Social Security disability benefits after a further twenty-four-month waiting period, or twenty-nine months after the onset of disability.

Many who receive Social Security disability benefits have impairments associated with aging. The share of insured workers who receive benefits rises sharply at older ages, from less than one percent of the youngest insured workers to about 15 percent of insured workers age 60–64 (Reno and Eichner, 2000). Relatively few individuals who receive Social Security disability insurance benefits return to work. Typically, they leave the disability benefit rolls when they die or reach retirement age and shift to Social Security retirement benefits. Workers' compensation paid \$29.4 billion in cash benefits and \$28.9 billion for medical care in 2009. In that year, Social Security paid \$118.3 billion in wage replacement benefits to disabled workers and their dependents and Medicare paid \$70.3 billion for medical and hospital care for disabled persons under age 65 (SSA, 2010d; CMS, 2010). Thus, aggregate workers' compensation cash benefits were about a quarter of the total amount of Social Security disability benefits, and workers' compensation medical benefits were about half of the total amount paid by Medicare. The much higher fraction paid by workers' compensation for medical benefits can best be attributed to the much greater provider cost controls that Medicare uses relative to workers' compensation. Medicare requires beneficiary cost sharing in the form of deductibles and co-insurance, and it does not cover certain services. At the same time, Medicare covers all medical conditions, not just work-related injuries or illnesses. When a worker receiving workers' compensation is a Medicare beneficiary, workers' compensation is the primary payer and Medicare is the secondary payer for care related to the occupational injury as a result of the Medicare Secondary Payer Act.

## Coordination between Workers' Compensation and Social Security Disability Insurance Benefits

If a worker becomes eligible for both workers' compensation and Social Security disability insurance benefits, one or both of the programs will limit benefits in order to avoid excessive payments relative to

the worker's past earnings. The Social Security amendments of 1965 required that Social Security disability benefits be reduced<sup>14</sup> (or "offset") so that the combined totals of workers' compensation and Social Security disability benefits do not exceed 80 percent of the workers' prior earnings.<sup>15</sup> Some states, however, had already established reverse offset laws, whereby workers' compensation payments would be reduced if the worker received Social Security disability benefits. Legislation in 1981 eliminated the states' option to adopt reverse offset laws, but the 15 states that already had such laws were allowed to keep them.<sup>16</sup>

*"As of December 2009, about 8.2 million disabled workers and 2.0 million of their dependents received Social Security disability benefits."*

As of December 2009, about 8.2 million disabled workers and 2.0 million of their dependents received Social Security disability benefits (Table 17). About 1.4 million of these individuals (or 13.9 percent) had some connection to workers' compensation or some other public disability benefits. Of these, 130 thou-

**Table 17**

**Social Security Disability Insurance (DI) Beneficiaries with Workers' Compensation (WC) or Public Disability Benefit (PDB)<sup>1</sup> Number and percentage of beneficiaries, by type of compensation and DI offset status, December 2010**

Type of Case	Total		Workers		Dependents	
	Number	Percent	Number	Percent	Number	Percent
All disability insurance beneficiaries	10,184,157	100.0	8,203,951	100.0	1,980,206	100.0
Total with some connection to WC or PDB	1,411,271	13.9	1,105,437	13.5	305,834	15.4
Current connection to WC or PDB	740,307	7.3	580,834	7.1	159,473	8.1
DI reduced by cap	129,807	1.3	93,293	1.1	36,514	1.8
DI not reduced by cap	377,698	3.7	305,141	3.7	72,557	3.7
Reverse jurisdiction	56,915	0.6	45,039	0.5	11,876	0.6
Pending decision on WC or PDB	175,887	1.7	137,361	1.7	38,526	1.9
DI previously offset of WC or PDB	670,964	6.6	524,603	6.4	146,361	7.4

1 Social Security disability benefits are offset against workers' compensation and certain other public disability benefits (PDB). In general, the PDB offset applies to disability benefits earned in state, local, or federal government employment that is not covered by Social Security.

SOURCE: Social Security Administrations' Office of Disability, unpublished tabulations (SSA 2010b)

14 The portion of workers' compensation benefits that offset SSDI are subject to federal income tax (IRC section 86(d)(3)).

15 The cap remains at 80 percent of the worker's average indexed earnings before disability, except that, in the relatively few cases when Social Security disability benefits for the worker and dependents exceed 80 percent of prior earnings, the benefits are not reduced below the Social Security amount. This cap also applies to coordination between Social Security disability insurance and other public disability benefits (OPDB) derived from jobs not covered by Social Security, such as state or local government jobs where the governmental employer has chosen not to cover its employees under Social Security.

16 States with reverse offset laws are: Colorado, Florida, Hawaii, Illinois, Louisiana, Minnesota, Montana, Nevada, New Jersey, New York, North Dakota, Ohio, Oregon, Washington, and Wisconsin.

sand persons (or 1.3 percent of the total) were currently receiving SSDI benefits that were reduced because of the offset and 671 thousand (or 6.6 percent of the total) had their Social Security benefits previously reduced because of the offset.

## Trends in Social Security Disability Benefits and Workers' Compensation

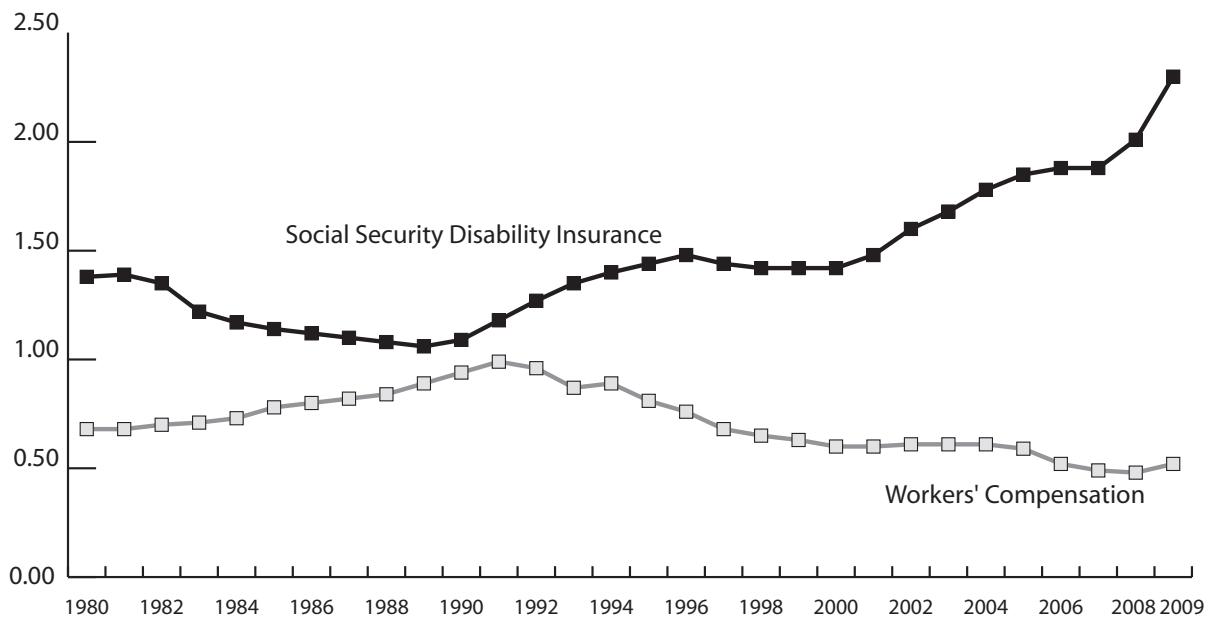
Figure 7 illustrates the long-term trend in Social Security disability benefits and workers' compensation cash benefits as a share of covered wages. Social Security disability benefits grew rapidly in the early 1970s and then declined through the 1980s, after policy changes in the late 1970s and early 1980s reduced benefits and tightened eligibility rules. From 1990 to 1996, Social Security benefits again rose as claims and allowances increased, particularly during the economic recession of 1990–1991. Between 1996–2001, disability insurance benefits relative to covered wages leveled off and then rose again following the recession of 2001.

The trend in workers' compensation cash benefits as a share of covered wages followed a different pattern. Workers' compensation benefits grew steadily throughout the 1980s and almost surpassed Social Security disability benefits in the early 1990s. Then, as workers' compensation cash benefits declined as a share of covered wages in 1992–2009, Social Security benefits generally rose. The opposite trends in workers' compensation and Social Security disability benefits during much of the last twenty-five years raise the question of whether retrenchments in one program increase demands placed on the other, and vice versa. The substitutability of Social Security disability benefits and workers' compensation for workers with severe, long-term disabilities that are, at least arguably, work related or might be exacerbated by the demands of work, has received little attention by researchers and is not well understood (Burton and Spieler, 2001).

A recent study finds that work-related disabilities are much more common than might previously have been thought, both among older persons in general

**Figure 7**

### Social Security Disability Insurance and Workers' Compensation Cash Benefits Per \$100 of Wages, 1980–2009



\* Starting in 1989, a new method was used to estimate covered wages for the workers' compensation program that accounts for the decrease of benefits as a percent of covered wages in that year.

Source: National Academy of Social Insurance and the Office of the Chief Actuary, Social Security Administration.

*“A recent study finds that work-related disabilities are much more common than might previously have been thought, both among older persons in general and among recipients of Social Security disability benefits.”*

and among recipients of Social Security disability benefits in particular (Reville and Schoeni, 2005). Based on reports in the 1992 Health and Retirement Study, more than one third (36 percent) of 51-61 year olds whose health limits the amount of work they can do became disabled because of an accident, injury, or illness at work. Of those receiving Social Security disability insurance, a similar portion (37 percent) attributed their disability to an accident, injury or illness at work. The study also finds that the 51-61 year olds who attribute their disabling conditions to their jobs are far more likely to receive Social Security disability insurance (29.0 percent) than to report ever having received workers' compensation (12.3 percent). It is important to note that these are self reported recollections of work related disability, and in most cases reported many years after the alleged work related disability. These self reported disabling injuries raise the logical question: if these were valid work injuries, why they were not reported and accepted by the system?

A recent study by Guo and Burton (2008) of state-level data provides empirical evidence that retrenchments in workers' compensation programs in the 1990s help explain the increase in Social Security disability insurance applications during the period. However, another study of data at the state level by McNerney and Simon (2011) found no relationship between changes in workers' compensation cash benefits and SSDI applications between 1986 and 2001. There is thus mixed evidence about whether a causal relationship exists between workers' compensation policy changes that reduce the generosity of the program and applications for disability insurance.

## **Incurred Benefits Compared with Paid Benefits**

The National Academy's estimates of workers' compensation benefits in this report are the amounts paid to workers in a calendar year regardless of whether the injuries occurred in that calendar year or in a previous year. This measure, calendar year paid benefits, is commonly used in reporting about other social insurance, private employee benefits, and other income security programs. A different measure, accident year incurred losses, which is equivalent to accident year incurred benefits, is commonly used for workers' compensation insurance purchased from private carriers and some state funds. It measures benefit liabilities incurred by the insurer for injuries that occur in a particular year, regardless of whether the benefits are paid in that year or in future years. (The terms "losses" and "benefits" are used interchangeably because benefits to the worker are losses to the insurer.) Both measures, calendar year paid benefits and accident year incurred benefits, reveal important information.<sup>17</sup>

*“Accident year incurred losses are benefit liabilities incurred by the insurer for injuries that occur in a particular year, regardless of whether the benefits are paid in that year.”*

For the purpose of setting insurance premiums, it is vital to estimate the incurred benefits that the premiums are to cover. When an employer purchases workers' compensation insurance for a particular policy period, the premiums cover current and future benefit liabilities for all injuries that occur during the policy period. State rating bureaus and the National Council on Compensation Insurance, which provides advisory ratemaking and statistical services in thirty-six states, focus on accident year (or policy year) incurred benefits.

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17 A fuller discussion of these measures is included in the Glossary and in Thomason, Schmidle, and Burton, 2001, Appendix B.

Accident year incurred benefits are more appropriate than calendar year paid benefits in estimating the ultimate amount of benefits that will be owed to newly injured workers in response to policy changes. For example, if a state lowered benefits or tightened compensability rules for new injuries as of a given date, then future benefits would be expected to decline. Similarly, if a state raised benefits or expanded the range of injuries that would be compensated by workers' compensation, then future benefits would be expected to increase. The policy change would show up immediately in estimates of accident year incurred benefits, but it would show up more slowly in measures of calendar year paid benefits because the latter measure includes payments for past

injuries that would not be affected by the policy change.

A disadvantage of relying solely on accident year incurred benefits is that it takes many years before the losses from a particular year are actually known; in the meantime, estimates for the losses for that accident year are updated annually. The National Council on Compensation Insurance updates accident year incurred benefits for sixteen years before the data for a particular year are considered final. In contrast, calendar year paid benefits are final at the end of the calendar year. Accident year incurred benefits are estimated for insurance policies purchased from private carriers and from some state funds, but

**Table 18**

**Comparison of Accident-Year Incurred Benefits with Calendar-Year Benefits Paid by Private Carriers and State Funds in Thirty-seven<sup>a</sup> States, 1998–2009**

Year	Accident Year Incurred Benefits <sup>a</sup>		Calendar Year Benefits Paid <sup>b</sup>	
	Billions of Dollars	Percent Change	Billions of Dollars	Percent Change
1998	10.8		11.6	
1999	11.8	9.6	11.5	-.8
2000	12.0	1.6	12.5	8.3
2001	12.3	2.2	12.9	3.3
2002	12.5	1.3	12.9	.2
2003	12.6	1.2	12.9	.0
2004	13.0	3.4	13.3	2.9
2005	13.1	.5	14.1	5.7
2006	13.7	4.8	13.9	-1.6
2007	14.8	7.8	14.2	2.3
2008	15.1	2.3	14.7	3.5
2009	13.4	-11.5	14.7	.2
Cumulative % change from 1998-2009		24.1	26.3	

- a. These data are for the thirty-seven states reported in the *Calendar-Accident Year Underwriting Results* of the National Council on Compensation Insurance, page 17. They include private carrier and state fund (where relevant) losses incurred in Alabama, Alaska, Arizona, Arkansas, Colorado, Connecticut, the District of Columbia, Florida, Georgia, Hawaii, Idaho, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Maryland, Mississippi, Missouri, Montana, Nebraska, Nevada, New Hampshire, New Mexico, North Carolina, Oklahoma, Oregon, Rhode Island, South Carolina, South Dakota, Tennessee, Texas, Utah, Vermont, and Virginia. The data for 1996-1999 include thirty-six states as Nevada is excluded. Accident year data exclude benefits paid under the following categories: underground coal mining, F-classification, national defense project, and excess business. The accident year data also exclude benefits paid under deductible policies.
- b. Based on National Academy of Social Insurance data in this report for the states listed in note (a). These data are for private carriers and states funds (where relevant) and excludes benefits paid under deductible policies

Source: NCCI 2010 and calendar year benefits estimated by the National Academy of Social Insurance.

this information is not routinely available for other state funds and for self-insured employers. In addition, accident year data exclude benefits that are the responsibility of employers under large deductible policies and all benefits of certain categories of privately insured employers (see footnote (a) of Table 18 for examples of privately insured employers).

For the years 1998 through 2009, Table 18 compares accident year incurred benefits reported by NCCI and calendar year paid benefits estimated by NASI for private carriers and state funds in the thirty-seven states included in the NCCI data. Both measures of workers' compensation benefits showed double-digit declines in 2009.



# Glossary

## General Terms for Workers' Compensation and Related Programs

**AASCIF:** The American Association of State Compensation Insurance Funds (AASCIF) is an association of workers' compensation insurance entities – referred to as state funds – that specialize in writing workers' compensation insurance in a U.S. state or Canadian province. For more information, visit [www.aascif.org](http://www.aascif.org).

**BLS:** The Bureau of Labor Statistics (BLS) in the U.S. Department of Labor is a statistical agency that collects, processes, analyzes, and disseminates statistical data about the labor market. For more information, visit [www.bls.gov](http://www.bls.gov).

**Black Lung Benefits:** See Coal Mine Health and Safety Act.

**Coal Mine Health and Safety Act:** The Coal Mine Health and Safety Act (Public Law 91-173) was enacted in 1969 and provides black lung benefits to coal miners disabled as a result of exposure to coal dust and to their survivors.

**Compromise and Release Agreement:** An agreement to settle a case that usually involves three elements: a compromise between the worker's claim and the employer's offer concerning the amount of cash and/or medical benefits to be paid; the payment of the compromised amount in a fixed amount (commonly called a "lump sum" but which may or may not be paid to the claimant at once); and the release of the employer from further liability.

**Covered Employment:** The NASI coverage data includes employees of those employers required to be covered by workers' compensation programs. A more inclusive measure of covered employment also includes employees of those employers that voluntarily elect coverage.

**Defense Base Act:** The Defense Base Act (DBA-42 U.S.C. §§ 1651-54) is a federal law extending the Longshore and Harbor Workers' Compensation Act

(33 U.S.C. §§ 901-50.) to persons (1) employed by private employers at United States defense bases overseas, or (2) employed under a public work contract with the United States performed outside the United States, or (3) employed under a contract with the United States performed outside United States under the Foreign Assistance Act, or (4) employed by an American contractor providing welfare or similar services outside the United States for the benefit of the Armed Services.

**Disability:** Loss of potential earning capacity as a consequence of an injury or disease (although there may not be an actual loss of earnings).

**DI:** Disability insurance from the Social Security program. See: SSDI.

**FECA:** The Federal Employees' Compensation Act (FECA-Public Law 103-3 or 5 U.S.C. §§ 8101-52) provides workers' compensation coverage to U.S. federal civilian and postal workers around the world for work-related injuries and occupational diseases.

**FELA:** The Federal Employers' Liability Act (FELA 45 U.S.C. § 51 et seq) gives railroad workers engaged in interstate commerce an action in negligence against their employer in the event of work-related injuries or occupational diseases.

**Guaranty Fund:** A guaranty fund is a special state-based fund that assumes all or part of the liability for workers' compensation benefits provided to a worker because the employer or insurance carrier legally responsible for the benefits is unable to make payments. Guaranty funds for private insurance carriers (all states with private carriers have these) and for self-insuring employers (less than half the states have these) are always separate funds.

**Group Self Insurance:** A special form of self insurance that is available to groups of employers; only available in a little over half the states.

**IAIABC:** The International Association of Industrial Accident Boards and Commissions (IAIABC) is the organization representing workers' compensation

agencies in the United States, Canada, and other nations and territories. For more information, visit [www.iaiaabc.org](http://www.iaiaabc.org).

**Jones Act:** The Jones Act is Section 27 of the Merchant Marine Act (P.L. 66-261) that extends the provision of the Federal Employers' Liability Act to seamen.

**LHWCA:** The Longshore and Harbor Workers' Compensation Act (LHWCA 33 U.S.C. §§ 901-50) requires employers to provide workers' compensation protection for longshore, harbor, and other maritime workers. See: Defense Base Act (DBA)

**NAIC:** The National Association of Insurance Commissioners (NAIC) is the national organization of the chief insurance regulators in each state, the District of Columbia, and five U.S. territories. It assists state insurance regulators, individually and collectively, to achieve insurance regulatory goals. For more information, visit [www.naic.org](http://www.naic.org).

**NCCI:** The National Council on Compensation Insurance, Inc. (NCCI) is a national organization that assists private carriers and insurance commissioners in collecting statistical information for pricing workers' compensation coverage in thirty-seven states. For more information, visit [www.ncci.com](http://www.ncci.com).

**OSHA:** The OSHAct created the Occupational Safety and Health Administration (OSHA) within the United States Department of Labor. OSHA is responsible for promulgating standards, inspecting workplaces for compliance, and prosecuting violations.

**OSHAct:** The Occupational Safety and Health Act (OSHAct Public Law 91-596) is a federal law enacted in 1970 that establishes and enforces workplace safety and health rules for nearly all private sector employers.

**Permanent Partial Disability (PPD):** A disability that, although permanent, does not completely limit a person's ability to work. A statutory benefit award is paid for qualifying injuries.

**Permanent Total Disability (PTD):** A permanent disability that is deemed by law to preclude material levels of employment.

**Second Injury Fund:** A second injury fund is a special fund that assumes all or part of the liability for workers' compensation benefits provided to a worker because of the combined effects of a work-related injury or disease with a preexisting medical condition.

**Self-Insurance:** Self insurance is an arrangement in which the employer assumes responsibility for the payment of workers' compensation benefits to the firm's employees with workplace injuries or diseases. Most employers do not self-insure but instead purchase workers' compensation insurance from a private carrier or state fund.

**SSA:** The U.S. Social Security Administration (SSA) administers the Social Security program, which pays retirement, disability, and survivors' benefits to workers and their families, and the federal Supplemental Security Income program that provides income support benefits to low-income aged and disabled individuals. For more information, visit [www.ssa.gov](http://www.ssa.gov).

**SSDI:** Social Security Disability Insurance (SSDI) pays benefits to insured workers who sustain severe, long-term work disabilities due to any cause. See: DI.

**Temporary Partial Disability (TPD):** A temporary disability that does not completely limit a person's ability to work.

**Temporary Total Disability (TTD):** A disability that temporarily precludes a person from performing the pre-injury job or another job at the employer that the worker could have performed prior to the injury.

**Unemployment Insurance (UI):** Federal/state program that provides cash benefits to workers who become unemployed through no fault of their own and who meet certain eligibility criteria set by the states.

**USDOL:** The U.S. Department of Labor administers a variety of federal labor laws including those that guarantee workers' rights to safe and healthful working conditions, a minimum hourly wage and overtime pay, freedom from employment discrimination, unemployment insurance, and other income support. For more information, visit [www.dol.gov](http://www.dol.gov).

**WC:** Workers' compensation. A form of government insurance mandated for most employers that provides statutory benefits for covered work related injuries.

**Work-Related Injury/Illness:** An injury or illness caused by activities related to the workplace. The usual legal test for "work-related" is "arising out of and in the course of employment." However, the definition of a work-related injury or disease that is compensable under a state's workers' compensation program can be quite complex and varies across states.

**WCRI:** The Workers Compensation Research Institute (WCRI) is a research organization providing information about public policy issues involving workers' compensation systems. For more information, visit [www.wcri.org](http://www.wcri.org)

## Terms for Workers' Compensation Insurance

**Accident Year:** The year in which an injury occurred or the year of onset or manifestation of an illness.

**Accident Year Incurred Benefits:** Benefits associated with all injuries and illnesses occurring in the accident year, regardless of the years in which the benefits are paid. (Also known as calendar-accident year incurred benefits.)

**Calendar Year Paid Benefits:** Benefits paid during a calendar year regardless of when the injury or illness occurred.

**Combined Ratio After Dividends:**  $[(1) \text{ Losses} + (2) \text{ Loss Adjustment Expenses} + (3) \text{ Underwriting Expenses} + (4) \text{ Dividends to Policyholders}] / \text{Net Premium}$ . The Combined Ratio After Dividends is expressed as a percentage of net premiums. (See Overall Operating Ratio.)

**Deductibles:** Under deductible policies written by private carriers or state funds, the insurer is responsible for paying all of the workers' compensation benefits, but employers are responsible for reimbursing the insurer for those benefits up to a specified deductible amount. Deductibles may be written into an insurance policy on a per injury basis, or an aggregate basis, or a combination of a per injury basis with an aggregate cap.

**Dividends to Policyholders:** Both mutual and some stock insurance companies offer policies that pay dividends to policyholders after the policy period. Dividends are based on favorable loss experience by the insurer or the policyholder.

**Incurred Losses (or Incurred Benefits):** Benefits paid to the valuation date plus liabilities for future benefits for injuries that occurred in a specified period, such as an accident year.

**Loss Adjustment Expenses:** Salaries and fees paid to insurance adjusters, as well as other expenses incurred from adjusting claims.

**Losses:** A flexible term that can be applied in several ways: Paid benefits, incurred benefits, fully developed, and possibly including incurred but not reported.

**Overall Operating Ratio:** The combined ratio after dividends minus net investment gain/loss and other income as a percent of net premium. (See Combined Ratio after Dividends.)

**Paid Losses (or Paid Benefits):** Benefits paid during a specified period, such as a calendar year, regardless of when the injury or disease occurred.

**Residual Market:** The mechanism used to provide insurance for employers who are unable to purchase insurance in the voluntary private market. In some

jurisdictions the state fund is the “insurer of last resort” and serves the function of the residual market. In others, there is a separate pool financed by assessments of private insurers, which is also known as an assigned risk pool.

**Underwriting Expenses:** Commissions, brokerage expenses, general expenses, taxes, licenses, and fees.

**Underwriting Results:** The underwriting experience of private insurance carriers. (See Combined Ratio After Dividends and Overall Operating Ratio.)

**Valuation Date:** A specific time at which data are evaluated in order to determine the losses (or benefits) paid to that date plus reserves as of that date.

# Appendix A: Coverage Estimates

The National Academy of Social Insurance's estimates of workers' compensation coverage start with the number of workers in each state who are covered by Unemployment Insurance (UI) (U.S. DOL, 2010e). Those who are not required to be covered include: some farm and domestic workers who earn less than a threshold amount from one employer; some state and local employees, such as elected officials; employees of some non-profit entities, such as religious organizations, for whom coverage is optional in some states; unpaid family workers; and railroad employees who are covered under a separate unemployment insurance program. Railroad workers are also not covered by state workers' compensation because they have other arrangements (NASI, 2002).

One category of workers who are not covered under either unemployment insurance or workers' compensation are self-employed individuals. All U.S. employers who are required to pay unemployment taxes must report quarterly to their state employment security agencies information about their employees and payroll covered by unemployment insurance. These employer reports are the basis for statistical reports prepared by the U.S. Bureau of Labor Statistics, known as the ES-202 data. These data are a census of the universe of U.S. workers who are covered by unemployment insurance.

Key assumptions underlying the NASI estimates of workers' compensation coverage, shown in Table A1, are:

- (1) Workers whose employers do not report that they are covered by UI are not covered by workers' compensation.
- (2) Workers that are reported to be covered by UI are generally covered by workers' compensation as well, except in the following cases:
  - (a) Workers in small firms (which are required to provide UI coverage in every state) are not covered by workers' compensation if the state law exempts small firms from mandatory workers' compensation coverage.
  - (b) Employees in agricultural industries (who may be covered by UI) are not covered by workers' compensation if the state law exempts agricultural employers from

mandatory workers' compensation coverage.

- (c) In Texas, where workers' compensation coverage is elective for almost all employers, estimates are based on periodic surveys conducted by the Texas Research and Oversight Council.

All federal employees are covered by workers' compensation, regardless of the state in which they work.

**Small Firm Exemptions.** NASI assumes that workers are not covered by workers' compensation if they work for small firms in the fifteen states that exempt small employers from mandatory coverage. Private firms with fewer than three employees are exempt from mandatory coverage in eight states: Arkansas, Georgia, Michigan, New Mexico, North Carolina, Virginia, West Virginia and Wisconsin. Those with fewer than four employees are exempt in two states: Florida, and South Carolina. Finally, firms with fewer than five employees are exempt from mandatory coverage in Alabama, Mississippi, Missouri, Oklahoma, and Tennessee (IAIABC-WCRI, 2011).

The number of employees in small firms is estimated using data from the U.S. Small Business Administration for each state, which show the proportion of employees in all private firms who worked for firms with fewer than five employees in 2007, the latest year for which data is available.

Those percentages for the fifteen states with numerical exemptions are: Alabama, 4.6 percent; Arkansas, 5.0 percent; Florida, 6.2 percent; Georgia, 4.9 percent; Michigan, 4.9 percent; Mississippi, 5.2 percent; Missouri, 4.9 percent; New Mexico, 5.6 percent; North Carolina, 4.9 percent; Oklahoma, 5.6 percent; South Carolina, 5.1 percent; Tennessee, 4.1 percent; Virginia, 4.9 percent; West Virginia, 5.5 percent and Wisconsin, 4.4 percent (U.S. SBA, 2010).

To estimate the proportion of workers in firms with fewer than three or four employees, we used national data on small firms from the U. S. Census Bureau (U.S. Census Bureau, 2005). Of workers in firms with fewer than five employees, 81.3 percent worked

**Table A1****Documenting Workers' Compensation Coverage Estimates, 2009 Annual Averages**

State	UI Covered Jobs <sup>a</sup>		Workers' Compensation Exemptions				WC as a % of UI (8)
	Total (1)	Private, non-farm firms (2)	Small Firm <sup>b</sup> (3)	Agriculture (4)	Texas (6)	WC Covered Jobs (7)	
Alabama	1,775,487	1,457,869	67,985	5,124	-	1,702,378	95.9
Alaska	296,747	234,494	-	-	-	296,747	100.0
Arizona	2,339,681	1,981,739	-	-	-	2,339,681	100.0
Arkansas	1,112,730	923,939	27,405	7,285	-	1,078,040	96.9
California	14,377,316	12,005,240	-	-	-	14,377,316	100.0
Colorado	2,147,956	1,817,784	-	11,171	-	2,136,785	99.5
Connecticut	1,596,091	1,364,688	-	-	-	1,596,091	100.0
Delaware	396,601	341,178	-	1,247	-	395,354	99.7
District of Columbia	481,695	446,481	-	-	-	481,695	100.0
Florida	7,049,650	6,061,367	305,023	55,606	-	6,689,021	94.9
Georgia	3,695,681	3,105,702	89,756	13,759	-	3,592,166	97.2
Hawaii	558,827	463,921	-	-	-	558,827	100.0
Idaho	600,284	483,352	-	-	-	600,284	100.0
Illinois	5,464,705	4,717,264	-	12,772	-	5,451,933	99.8
Indiana	2,666,317	2,285,289	-	11,173	-	2,655,144	99.6
Iowa	1,427,103	1,195,791	-	12,547	-	1,414,556	99.1
Kansas	1,291,276	1,058,126	-	8,708	-	1,282,568	99.3
Kentucky	1,670,675	1,404,693	-	4,098	-	1,666,577	99.8
Louisiana	1,817,241	1,492,046	-	4,499	-	1,812,742	99.8
Maine	566,796	479,943	-	2,532	-	564,264	99.6
Maryland	2,329,265	1,979,922	-	3,598	-	2,325,667	99.8
Massachusetts	3,086,667	2,717,140	-	-	-	3,086,667	100.0
Michigan	3,721,368	3,152,236	90,654	22,527	-	3,608,187	97.0
Minnesota	2,535,812	2,180,844	-	15,122	-	2,520,690	99.4
Mississippi	1,054,444	830,602	43,067	7,632	-	1,003,745	95.2
Missouri	2,550,225	2,164,680	106,432	8,395	-	2,435,398	95.5



Montana	407,419	335,797	-	407,419	100.0
Nebraska	884,952	733,201	9,412	875,540	98.9
Nevada	1,120,379	983,569	2,042	1,118,337	99.8
New Hampshire	597,247	516,501	-	597,247	100.0
New Jersey	3,712,006	3,150,653	-	3,712,006	100.0
New Mexico	759,597	593,828	16,990	734,396	96.7
New York	8,217,037	6,881,929	19,486	8,197,551	99.8
North Carolina	3,755,654	3,115,030	89,124	3,644,633	97.0
North Dakota	339,874	281,051	2,665	337,209	99.2
Ohio	4,865,684	4,187,232	-	4,865,684	100.0
Oklahoma	1,451,269	1,166,508	65,201	1,379,082	95.0
Oregon	1,578,054	1,299,749	-	1,578,054	100.0
Pennsylvania	5,363,065	4,722,217	19,045	5,344,020	99.6
Rhode Island	438,585	387,482	708	437,877	99.8
South Carolina	1,734,262	1,422,678	58,475	1,669,582	96.3
South Dakota	377,710	314,507	3,358	374,352	99.1
Tennessee	2,515,171	2,143,465	87,569	2,421,919	96.3
Texas	9,951,723	8,322,615	43,759	7,818,102	78.6
Utah	1,121,365	951,332	3,864	1,117,501	99.7
Vermont	285,862	237,815	1,961	283,901	99.3
Virginia	3,379,420	2,854,296	8,485	3,289,994	97.4
Washington	2,763,519	2,244,855	66,511	2,697,008	97.6
West Virginia	668,413	551,316	17,625	649,888	97.2
Wisconsin	2,614,063	2,239,549	57,343	2,538,508	97.1
Wyoming	266,990	207,583	-	266,990	100.0
U.S. non-federal	125,779,960	106,191,088	1,203,589	122,029,324	97.0
Federal	2,826,653	-	457,185	2,826,653	
100.0					
U.S. TOTAL	128,606,613	106,191,088	1,203,589	124,855,977	97.1

a U1-covered employment reported in the ETA-202 data produced by the United States Bureau of Labor Statistics (U.S. DOL, 2010f)

b Data not available for 2009, used the 2007 data.

Source: National Academy of Social Insurance estimates.

in firms with fewer than four employees and 58.5 percent worked in firms with fewer than three employees. These ratios were applied to the percentage of workers in firms with fewer than five employees in the respective states. For example, the proportion of Arkansas private sector workers in firms with fewer than three employees is: (5.1 percent) x (58.5 percent) = 3.0 percent. These ratios are applied to the number of UI-covered workers in private, non-farm firms in each state. In the fifteen states together, we estimate that 1.1 million workers were excluded from workers' compensation coverage in 2009 because of the small employer exclusion from mandatory coverage.

**Agricultural Exemptions.** We estimate agricultural workers to be excluded from workers' compensation coverage if they work in any state where agricultural employers are exempt from mandatory coverage. The

following thirteen states have no exemptions for agricultural workers: Alaska, Arizona, California, Connecticut, Hawaii, Idaho, Massachusetts, Montana, New Hampshire, New Jersey, Ohio, Oregon, and Wyoming. In all the other jurisdictions we subtract from UI coverage those workers employed in agricultural industries.

**Texas.** In Texas, where workers' compensation coverage is elective for almost all employers, the NASI estimate of coverage is based on periodic surveys conducted by the Texas Department of Insurance and the Workers' Compensation Research and Evaluation Group, which found 79 percent of Texas employees were covered in 2009 (TDI et al, 2010). This ratio was applied to all UI-covered Texas employees other than federal government workers (who were not included in the Texas surveys).

# Appendix B: 2009 Survey Questionnaire

Annual Data Survey - Project on National Data for Workers' Compensation, 2009		National Academy of Social Insurance	
page 1		page 2	
Your Name:	State:	Agency/Organization:	Fax:
E-mail:	Phone:		
<p><b>Calendar Year Paid Data</b> – Please provide the information requested below for calendar years 2005-2009. Calendar year paid data refer to all payments made that year, regardless of accident year and regardless of whether the case was closed or remains open. If you are unable to report calendar year data, please indicate the 12-month period of the data you are reporting. Please be sure to list benefits paid, not incurred. If your agency does not have the data to fill out this questionnaire, please send NASI the contact information for the entity or person in your state that may have the information.</p>			
	CY 2009 Payments	CY 2008 Payments	CY 2007 Payments
<b>1) INDIVIDUAL SELF-INSURERS</b>			
Medical Payments			
Cash Payments			
Compromise lump sum settlements (if not included above)			
<b>TOTAL</b>			
Is Group Self Insurance allowed in your state?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
Does the total above include Group Self Insured?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
If not, fill in 2)			
<b>2) GROUP SELF-INSURERS</b>			
Medical Payments			
Cash Payments			
Compromise lump sum settlements (if not included above)			
<b>TOTAL</b>			
<b>3) PRIVATE CARRIERS</b>			
Medical Payments			
Cash Payments			
Compromise lump sum settlements (if not included above)			
<b>TOTAL</b>			
<b>4) STATE FUNDS</b> (if state has competitive or exclusive fund)			
Medical Payments			
Cash Payments			
Compromise lump sum settlements (if not included above)			
<b>TOTAL</b>			
Does the amount above include deductible payments by employers?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
How much was paid under the deductible amounts?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
<b>5) STATE FUNDS</b> (if state has competitive or exclusive fund)			
Medical Payments			
Cash Payments			
Compromise lump sum settlements (if not included above)			
<b>TOTAL</b>			
Are deductibles allowed for the state fund?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
Does the amount above include deductible payments by employers?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
How much was paid under the deductible amounts?			

	CY 2009 Payments	CY 2008 Payments	CY 2007 Payments	CY 2006 Payments	CY 2005 Payments
<b>5) SPECIAL FUNDS</b> (including second injury, and other)					
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL					
Is this amount included in items 3 and/or 4? Is so, which and how much?	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>	yes <input type="checkbox"/> no <input type="checkbox"/>
<b>6) INSURANCE GUARANTY FUNDS</b>					
Medical Payments					
Cash Payments					
Compromise "lump sum settlements" (if not included above)					
TOTAL					
<b>7) SELF-INSURED GUARANTY FUNDS</b>					
Cash Payments					
Compromise "lump sum settlements" (if not included above)					
TOTAL					
<b>8) CALENDAR YEAR TOTAL BENEFITS PAID</b> (Should equal the sum of items #1-7)					
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL					
Are you attaching additional information?					
Please e-mail your response to NASI at <a href="mailto:isen Gupta@nasi.org">isen Gupta@nasi.org</a> or fax to 202-452-8111 by November 5, 2010					
For more information contact Ishita Sen Gupta by e-mail at <a href="mailto:isen Gupta@nasi.org">isen Gupta@nasi.org</a> or by phone at 202-452-8097.					

# Appendix C: Data Availability

Estimates of benefits paid and employer costs for workers' compensation by the National Academy of Social Insurance (NASI) rely on two main sources: responses to the NASI survey questionnaire from state agencies and data purchased from A.M. Best, a private company that specializes in collecting insurance data and rating insurance companies.

The A.M. Best data show the experience of private carriers in every state, but do not include any information about self-insured employers or about benefits paid under deductible arrangements. The A.M. Best data show total "direct losses" (that is, benefits) paid in each state in 2005–2009, by private carriers and by twenty-one entities that we classify as state funds, based on their membership in the American Association of State Compensation Insurance Funds. A.M. Best did not provide information on the exclusive state funds in Ohio, North Dakota, Washington, and Wyoming. The 2009 NASI survey questionnaire for state agencies asked states to report data for five years, from 2005 through 2009. These historical data were used to revise and update estimates for these past years. Table C1 describes the sources of data available for each state used in the data report.

## Private Carrier Benefits

Of the 51 jurisdictions, 47 allow private carriers to write workers' compensation policies. Of these, we used the agency data for 15 jurisdictions and rating bureau data for 3 states that were able to provide data on the amount of benefits paid by private carriers. In the other states, A.M. Best data were used to estimate private carrier benefits. An estimate of benefits paid under deductible policies was added to benefits paid reported by A.M. Best to estimate total private carrier benefits in these states. Methods for estimating deductible amounts are described in Appendix G.

## State Fund Benefits

Twenty-six states had a state fund that paid workers' compensation benefits in 2009. Of these, 11 were able to provide benefit data. A.M. Best data and NAIC (National Association of Insurance Commissioners) data were used to estimate state fund benefits in states unable to provide the data. An estimate of benefits paid under deductible policies

was added to benefits reported by A.M. Best to estimate total state fund benefits in these states.

## Self-Insured Benefits

All jurisdictions except North Dakota and Wyoming allow employers to self-insure. Thirty-three of these jurisdictions were able to provide data on benefits paid by self-insurers. Prior years' self-insured benefit ratios to total benefits were used to estimate the self-insurance data for four states. Self-insurance benefits were imputed for the 12 states that were unable to provide data. The self-insurance imputation methods are described in Appendix E.

## Second Injury Funds

Thirty-nine states have provided us with second injury fund data. There were 12 states for which second injury fund data were not available. For states where the data were available for reporting purposes, they were distributed evenly across private carriers, state funds and self-insured employers according to their share in the total. Second-injury funds are financed through general state revenues or assessments on workers' compensation insurers and self-insuring employers. Second injury fund data are given in Table J1.

## Insurance Guaranty Funds and Self-Insurance Guaranty Funds

Guaranty Funds cover the outstanding claims of insolvent insurance companies, the property and casualty guaranty fund system. Self-insurance guaranty funds ensure the payment of outstanding workers' compensation liabilities of self-insured employers that went insolvent. For states where data were available, the insurance guaranty fund data was included in the private carriers' benefits data and the self-insurance guaranty funds data were included in the self-insurance benefits data for that state.

## Benefits under Deductible Policies

Forty-seven jurisdictions allow carriers to write deductible policies for workers compensation. Of these jurisdictions, five were able to provide the amount of benefits paid under deductible policies. Benefits under deductible arrangements were estimated for another 14 states by subtracting A.M. Best data on benefits paid (which do not include

deductible benefits) from data reported by the state agency (which, in these cases, included deductible benefits). Deductible benefits in the remaining states were estimated using a ratio of Manual Equivalent Premiums, as described in Appendix G.

## Medical Benefits

The state workers' compensation agency data and rating bureau data for medical share were used in thirteen states. The National Council on Compensation Insurance estimates of the medical share of the benefits were used in 37 jurisdictions. Other methods were used for one state for which no information was available from the state or NCCI. More detail on methods to estimate medical benefits is in Appendix F.

## Employer Costs

NASI estimates of employer costs for benefits paid under private insurance and state funds are the sum of "direct premiums written" as reported by A.M. Best and the NAIC, plus our estimate of benefits paid under deductible arrangements (which are not reflected in premiums). In some cases, data provided by state agencies are used instead of A.M. Best data.

State fund premium data for North Dakota, Ohio and Washington were provided by the state agencies. For self-insured employers, the costs include benefit payments and administrative costs. Because self-insured employers often do not separately record administrative costs for workers' compensation, their administrative costs must be estimated. The costs are assumed to be the same share of benefits as administrative costs reported by private insurers to the National Association of Insurance Commissioners (NAIC, 1998-2008). These administrative costs include direct defense and cost containment expenses paid<sup>19</sup> and expenses for taxes, licenses, and fees.<sup>20</sup>

The ratios of these administrative costs to direct losses paid by private insurers were:

2005: 18.7 percent

2006: 19.9 percent

2007: 19.1 percent

2008: 16.6 percent

2009: 16.08 percent

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19 Direct Defense and Cost Containment Expense Paid: In 1999, as part of a clarification effort, this line was renamed from "Direct Allocated Loss Adjustment Expenses" to "Direct Defense and Cost Containment Expenses." It includes defense, litigation and medical cost containment expenses, whether internal or external. The fees charged for insurer employees should include overhead, just as an outside firm's charges would include. The expenses exclude expenses incurred in the determination of coverage.

20 Taxes, Licenses, and Fees: State and local insurance taxes deducting guaranty association credits, insurance department licenses and fees, gross guaranty association assessments, and all other (excluding federal and foreign income and real estate).



**Table C1****Data Sources for 2009**

State	Private Carrier	State Fund	Self-Insured	Second Injury Fund	Guaranty Fund	Self-Insurance Guaranty Fund	PC Deductible	SF Deductible	Medical
Alabama	Agency	-	Agency	n.a	n.a	n.a	Subtraction	-	NCCI
Alaska	Agency	-	Agency	Agency	Agency	n.a	Subtraction	-	NCCI
Arizona	AMBest	AMBest	Agency	Agency	n.a	n.a	Manual Premium Method	Manual Premium Method	NCCI
Arkansas	AMBest	-	Agency	Agency	AR Property and Insurance GF	Agency	Manual Premium Method	-	NCCI
California	Rating Bureau	AMBest	Agency	Subsequent Injury Fund and Uninsured Employers Fund	CA Insurance Guaranty Assn.	n.a	Subtraction	Not Allowed	Rating Bureau
Colorado	AMBest	AMBest	Agency	Agency	Western GF Services	n.a	Manual Premium Method	Manual Premium Method	NCCI
Connecticut	AMBest	-	Agency	Agency	n.a	n.a	Manual Premium Method	-	NCCI
Delaware	AMBest	-	Agency	Agency	n.a	n.a	Agency given	-	Rating Bureau
D.C.	AMBest	-	Imputation	n.a	n.a	n.a	Manual Premium Method	-	NCCI
Florida	AMBest	-	Agency	n.a	n.a	n.a	Manual Premium Method	-	NCCI
Georgia	AMBest	-	Imputation	Subsequent Injury Trust Fund	GA Insurers Insolvency Pool	Agency	Manual Premium Method	-	NCCI
Hawaii	Agency (includes SF)	AMBest	Agency	Agency	n.a	n.a	Subtraction	Subtraction	NCCI
Idaho	AMBest	AMBest	Imputation	Agency	Western GF Services	n.a	Manual Premium Method	Manual Premium Method	NCCI
Illinois	AMBest	-	Imputation	Agency	-	n.a	Manual Premium Method	-	NCCI
Indiana	AMBest	-	Agency	Workers Compensation Board	-	n.a	Manual Premium Method	-	NCCI
Iowa	AMBest	-	Imputation	Second Injury Fund	IA Insurance Guaranty Assn.	n.a	Manual Premium Method	-	NCCI
Kansas	AMBest	-	Agency	Agency	Western GF Services	n.a	Manual Premium Method	-	NCCI
Kentucky	AMBest	AMBest	Imputation	Agency	KY Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium Method	NCCI
Louisiana	AMBest	AMBest	Agency	Agency	LA Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium Method	NCCI
Maine	AMBest	AMBest	Agency	n.a	n.a	n.a	Manual Premium Method	Manual Premium Method	NCCI
Maryland	Agency	Agency	Agency	Second Injury Fund	n.a	n.a	Subtraction	Subtraction	NCCI
Massachusetts	Agency	-	Agency	Rating Bureau	MA Insurers Insolvency Fund	n.a	Subtraction	-	Rating Bureau
Michigan	Agency	-	Agency	Agency	MI Property & Casualty Guaranty Assn.	Agency	Subtraction	-	Agency
Minnesota	Agency	Agency	Agency	Agency	Agency	Agency	Agency given	Not Allowed	Agency
Mississippi	Agency	-	Agency	Agency	n.a	n.a	Subtraction	-	NCCI

## Table C1 continued

### Data Sources for 2009

State	Private Carrier	State Fund	Self-Insured	Second Injury Fund	Guaranty Fund	Self-Insurance Guaranty Fund	PC Deductible	SF Deductible	Medical
Missouri	A.M. Best	A.M. Best	Agency	Agency	n.a.	Agency	Subtraction	Manual Premium Method	NCCI
Montana	Agency	Agency	Agency	Agency	Western GF Services	n.a.	Subtraction	Subtraction	NCCI
Nebraska	AMBEST	-	Imputation	WC Trust Fund	n.a.	n.a.	Manual Premium Method	-	NCCI
Nevada	AMBEST	-	Agency	Agency	n.a.	n.a.	Manual Premium Method	-	NCCI
New Hampshire	AMBEST	-	Imputation	Agency	n.a.	n.a.	Manual Premium Method	-	NCCI
New Jersey	Rating Bureau	-	Imputation	Agency	Rating Bureau	Agency	Subtraction	-	Rating Bureau
New Mexico	Agency	Agency	Agency	Agency	Agency	n.a.	Subtraction	Subtraction	NCCI
New York	Rating Bureau	AMBEST	Agency	n.a.	n.a.	n.a.	Subtraction	Not Allowed	Rating Bureau
North Carolina	AMBEST	-	Imputation	n.a.	n.a.	n.a.	Manual Premium Method	-	NCCI
North Dakota	-	Agency	-	n.a.	n.a.	n.a.	-	Agency given	Agency
Ohio	AMBEST	Agency	Imputed from previous years data	n.a.	n.a.	n.a.	Not Allowed	Not Allowed	Agency
Oklahoma	AMBEST	AMBEST	Agency	Agency	n.a.	n.a.	Manual Premium Method	Manual Premium Method	NCCI
Oregon	Agency	Agency	Agency	Agency	Agency	Agency	Agency given	Not Allowed	NCCI
Pennsylvania	Agency	Agency	Agency	Agency	Agency	Agency	Agency Given	Not allowed	Agency
Rhode Island	AMBEST	AMBEST	Imputed from previous years data	Workers' Compensation Administrative Fund	n.a.	n.a.	Manual Premium Method	Manual Premium Method	NCCI
South Carolina	Agency	Agency	Agency	Agency	SC Property & Casualty Insurance Guaranty Assn.	n.a.	Agency given	Not Allowed	NCCI
South Dakota	Agency	-	Agency	n.a.	n.a.	n.a.	Subtraction	-	NCCI
Tennessee	AMBEST	-	Agency	Agency	n.a.	n.a.	Manual Premium Method	-	NCCI
Texas	AMBEST	AMBEST	Imputed from previous years data	WC Subsequent Injury Fund	TX Guaranty Fund	n.a.	Manual Premium Average ratio	MPNational Method	NCCI
Utah	AMBEST	AMBEST	Imputation Employers Reinsurance Fund		n.a.	n.a.	Manual Premium Method	Manual Premium Method	NCCI
Vermont	AMBEST	-	Imputed from previous years data	n.a.	n.a.	n.a.	Manual Premium Method	-	NCCI
Virginia	Agency	-	Imputation	n.a.	n.a.	n.a.	Subtraction	-	NCCI
Washington	AMBEST	Agency	Agency	Agency	n.a.	Agency	Not Allowed	Not Allowed	Agency
West Virginia	AMBEST	Agency	Agency	Agency	n.a.	Agency	Not Allowed	Not Allowed	Agency
Wisconsin	AMBEST	-	Agency	Agency	n.a.	n.a.	Not Allowed	-	Agency
Wyoming	AMBEST	NAIC data	-	n.a.	Western GF Services	n.a.	Not Allowed	Not Allowed	National Average

'n.a.'- Data not available

## Appendix D: Revised Data for 2005–2008

In preparing the 2009 estimates for workers' compensation benefits, the National Academy of Social Insurance reviewed and revised all data for calendar years 2005-2008. These revised data are shown in Tables D1 to D4. The revision process began by requesting historical data from state workers' compensation agencies and from A.M. Best. The revised benefit estimates are reported in the following tables. Revisions to the historical data increase consistency in historical methodology and enhance comparability between years. The following are key revisions made to the historical data:

1. Revised data consistently use the same medical benefit estimation methodology described in Appendix F.
2. Revised data consistently use the same deductible estimation methodology described in Appendix G.
3. Self-insurance benefit imputations were revised using historical data as reported in Appendix E.
4. Changes in data reported by state agencies were captured by the revised data questionnaire and are reflected in the revised estimates
5. Administrative costs for self-insurance were re-estimated based on updated information from the National Association of Insurance Commissioners as described in Appendix C.
6. The California data were revised to exclude loss adjustment expenses as a component of paid benefits.
7. The New Jersey data on self-insured employers are now based on data from the New Jersey Department of Labor and Workforce Developments rather than on a national average of the share of benefits accounted for by self-insuring employers.

The revised data in this appendix should be used in place of previously published data. Historical data displayed in the body of this report incorporate these revisions.

Table D5 is the corrected version of table 9.B1 of the *Annual Statistical Supplement to the Social Security Bulletin, 2010*.

**Table D1****Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2008 (in thousands)**

State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>c</sup>
Alabama	\$313,543		\$343,065	\$656,607	68.8	\$451,746
Alaska	151,424		53,939	205,363	64.1	131,638
Arizona	219,987	\$356,385	114,629	691,001	68.1	470,571
Arkansas	157,387		75,882	233,270	65.1	151,859
California	4,704,618	1,843,747	2,918,040	9,466,406	54.5	5,155,395
Colorado	277,586	387,822	251,393	916,801	49.9	457,484
Connecticut	561,708		216,479	778,187	44.4	345,515
Delaware	156,846		61,638	218,484	60.0	131,090
District of Columbia	67,712		12,456	80,168	35.5	28,460
Florida	1,996,887		838,546	2,835,433	64.3	1,823,183
Georgia	1,132,415		444,677	1,577,091	48.4	763,312
Hawaii	131,389	28,589	85,784	245,763	43.2	106,170
Idaho	80,639	158,227	41,944	280,810	61.5	172,698
Illinois	2,155,660		765,940	2,921,600	48.4	1,414,054
Indiana	559,406		66,401	625,807	71.0	444,323
Iowa	430,658		124,714	555,372	54.1	300,456
Kansas	297,345		117,234	414,578	60.0	248,747
Kentucky	387,827	89,048	225,250	702,125	57.5	403,722
Louisiana	413,118	154,683	287,220	855,021	50.5	431,786
Maine	88,132	92,052	83,600	263,784	47.2	124,506
Maryland	507,854	228,218	199,876	935,948	44.9	420,241
Massachusetts	736,557		119,250	855,807	35.5	304,150
Michigan	853,905		553,377	1,407,282	36.2	509,563
Minnesota	712,178	56,199	257,560	1,025,937	51.1	524,330
Mississippi	198,841		137,262	336,103	59.3	199,309
Missouri	581,449	89,754	235,190	906,393	55.9	506,674
Montana	79,942	128,606	44,929	253,477	59.3	150,312
Nebraska	252,821		70,880	323,702	62.2	201,342
Nevada	290,032		140,228	430,260	46.3	199,210
New Hampshire	189,437		51,974	241,411	61.5	148,468

New Jersey	1,539,695	411,849	1,951,545	48.2	940,181
New Mexico	148,793	32,783	271,396	59.5	161,481
New York	1,670,945	1,032,617	3,859,233	51.0	1,968,209
North Carolina	1,069,363	386,377	1,455,740	45.6	663,818
North Dakota <sup>a</sup>	57	105,780	105,837	58.5	61,936
Ohio <sup>a</sup>	23,746	2,055,456	2,490,080	43.9	1,092,704
Oklahoma	318,484	275,298	772,191	43.8	338,220
Oregon	238,164	281,808	607,414	51.9	315,248
Pennsylvania	1,929,826	348,716	2,902,243	46.5	1,348,210
Rhode Island	47,396	90,530	158,721	32.1	50,949
South Carolina	659,489	58,648	917,419	41.0	376,142
South Dakota	106,068	5,116	111,184	67.0	74,493
Tennessee	617,911	165,238	783,149	52.9	414,286
Texas	890,594	336,316	1,538,972	61.2	941,851
Utah	102,341	144,683	302,453	71.6	216,556
Vermont	110,725	16,940	127,665	53.1	67,790
Virginia	839,691	272,752	1,112,443	58.0	645,217
Washington <sup>a</sup>	21,340	1,665,190	2,192,885	36.4	798,723
West Virginia <sup>a</sup>	177,604	262,456	488,013	37.4	182,713
Wisconsin	973,119	181,535	1,154,654	73.6	849,445
Wyoming <sup>a</sup>	2,370	134,764	137,135	51.8	71,103
Non-federal total	\$30,175,028	\$10,438,376	\$54,680,365	51.8	\$28,299,589
Federal <sup>d</sup>			3,423,825	27.9	956,148
Federal employees <sup>e</sup>			2,676,370	29.8	798,039
TOTAL			\$58,104,190	50.4	\$29,255,738

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

a. States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL & HW act or employers liability coverage which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

d. Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

e. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

**Table D2****Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2007 (in thousands)**

State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>c</sup>
Alabama	\$310,809		\$324,506	\$635,315	68.5	\$435,345
Alaska	136,891		51,395	188,286	62.5	117,754
Arizona	189,910	\$398,247	108,301	696,457	68.9	480,026
Arkansas	165,694		78,152	243,846	63.6	154,966
California	4,538,304	1,994,915	3,018,272	9,551,491	51.2	4,888,685
Colorado	234,050	409,245	235,479	878,774	47.5	417,309
Connecticut	542,238		187,577	729,815	43.7	319,001
Delaware	145,967		66,739	212,706	57.1	121,455
District of Columbia	72,069		14,031	86,101	36.6	31,532
Florida	2,111,385		804,062	2,915,447	62.3	1,815,169
Georgia	1,065,315		429,048	1,494,363	48.5	724,703
Hawaii	129,383	33,022	84,889	247,294	42.3	104,568
Idaho	74,972	149,973	42,816	267,761	60.9	163,095
Illinois	2,013,381		725,539	2,738,920	47.2	1,293,658
Indiana	537,323		62,067	599,391	70.2	420,902
Iowa	387,357		108,452	495,808	51.6	255,686
Kansas	273,928		120,352	394,280	61.3	241,507
Kentucky	356,297	85,181	206,760	648,237	58.0	376,178
Louisiana	309,668	156,973	265,945	732,586	52.6	385,580
Maine	99,859	91,430	85,537	276,826	43.3	119,941
Maryland	444,227	236,735	168,888	849,850	43.1	366,134
Massachusetts	781,504		121,126	902,630	34.7	313,538
Michigan	915,946		595,335	1,511,282	35.6	537,717
Minnesota	649,492	55,194	254,298	958,984	50.1	480,239
Mississippi	175,822		147,053	322,875	57.9	187,039
Missouri	528,141	84,389	258,530	871,060	54.6	475,220
Montana	72,847	125,979	44,047	242,872	56.7	137,824
Nebraska	219,884		64,375	284,259	62.8	178,488
Nevada	292,047		122,385	414,432	45.6	189,127



New Hampshire	167,544	40,878	208,422	61.4	128,039
New Jersey	1,502,872	346,173	1,849,044	48.0	887,641
New Mexico	154,124	84,464	273,363	58.6	160,274
New York	1,475,900	953,919	3,388,936	36.0	1,220,017
North Carolina	958,966	385,795	1,344,761	45.7	615,012
North Dakota <sup>a</sup>	129	91,612	91,741	56.1	51,485
Ohio <sup>a</sup>	19,335	2,017,613	2,478,080	41.5	1,029,325
Oklahoma	269,380	165,593	700,341	43.0	300,913
Oregon	229,899	83,085	589,388	53.5	315,223
Pennsylvania	1,843,513	618,122	2,803,819	44.6	1,251,734
Rhode Island	42,212	19,401	152,227	34.6	52,740
South Carolina	627,066	208,930	886,000	41.9	371,274
South Dakota	115,235	4,332	119,567	66.6	79,616
Tennessee	616,695	134,682	751,377	54.0	405,797
Texas	825,474	289,290	1,425,946	61.0	870,042
Utah	90,439	50,713	285,395	70.5	201,279
Vermont	103,286	15,813	119,099	50.4	60,024
Virginia	796,504	274,165	1,070,668	57.4	614,371
Washington <sup>a</sup>	21,895	1,502,012	1,995,744	36.2	723,226
West Virginia <sup>a</sup>	166,712	293,883	510,806	35.6	181,828
Wisconsin	929,997	164,077	1,094,074	74.2	811,496
Wyoming <sup>a</sup>	4,038	122,959	126,996	49.8	63,188
Non-federal total	\$28,735,925	\$10,323,253	\$52,657,740	49.6	\$26,126,932
Federal <sup>d</sup>			3,339,892	27.2	909,808
Federal employees <sup>e</sup>			2,586,700	29.1	752,742
TOTAL			\$55,997,632	48.3	\$27,036,740

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

a. States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL & HW act or employers liability coverage which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

d. Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

e. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

**Table D3****Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2006 (in thousands)**

State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>c</sup>
Alabama	\$303,014		\$321,671	\$624,685	66.6	\$416,040
Alaska	138,990		47,517	186,507	58.4	108,920
Arizona	164,628	\$380,293	102,507	647,427	69.3	448,667
Arkansas	154,701		81,186	235,887	64.2	151,440
California	4,687,391	2,233,880	3,030,950	9,952,220	47.4	4,715,053
Colorado	242,416	422,717	238,814	903,947	49.2	444,742
Connecticut	525,887		192,553	718,441	44.3	318,269
Delaware	151,421		87,217	238,638	58.2	138,887
District of Columbia	75,511		14,957	90,468	40.8	36,911
Florida	2,222,191		703,784	2,925,976	64.0	1,872,624
Georgia	982,899		411,071	1,393,970	50.4	702,561
Hawaii	134,638	28,644	79,403	242,685	40.7	98,773
Idaho	58,914	146,980	47,745	253,639	62.0	157,256
Illinois	1,852,667		591,552	2,444,219	48.2	1,178,114
Indiana	509,629		54,304	563,934	69.3	390,806
Iowa	384,759		103,926	488,684	52.6	257,048
Kansas	266,908		123,735	390,643	58.6	228,917
Kentucky	349,297	84,622	204,055	637,975	58.9	375,767
Louisiana	348,887	128,699	240,950	718,535	52.8	379,387
Maine	112,330	96,384	81,265	289,980	41.1	119,182
Maryland	437,454	239,459	152,050	828,962	43.2	358,112
Massachusetts	809,914		119,593	929,507	35.3	327,920
Michigan	852,208		618,366	1,470,574	37.3	547,794
Minnesota	635,694	62,759	245,995	944,448	50.2	474,459
Mississippi	163,074		147,668	310,742	58.2	180,852
Missouri	506,642	80,505	244,178	831,325	52.4	435,614
Montana	75,086	118,081	41,092	234,259	57.6	134,933
Nebraska	210,020		61,972	271,992	62.7	170,539
Nevada	290,274		127,008	417,282	45.1	188,194

New Hampshire	175,366	44,671	220,037	59.7	131,362
New Jersey	1,419,170	328,875	1,748,045	49.6	866,508
New Mexico	145,169	92,056	270,273	57.4	155,137
New York	1,489,756	962,977	3,510,955	36.0	1,263,944
North Carolina	971,742	342,983	1,314,725	44.8	588,997
North Dakota <sup>a</sup>	81,297	81,297		55.6	45,218
Ohio	26,343	435,758	2,383,544	44.1	1,051,774
Oklahoma	246,579	159,919	675,113	44.1	297,725
Oregon	219,517	81,226	568,739	54.0	307,119
Pennsylvania	1,797,351	607,649	2,758,784	43.8	1,209,115
Rhode Island	39,828	15,354	149,413	33.0	49,306
South Carolina	634,837	219,016	918,650	45.9	421,431
South Dakota	105,368	3,662	109,030	65.0	70,869
Tennessee	599,491	216,444	815,935	51.6	421,022
Texas	830,127	285,274	1,419,823	60.6	860,413
Utah	78,808	44,093	261,400	70.1	183,242
Vermont	107,892	16,337	124,228	50.3	62,487
Virginia	620,331	188,370	808,701	59.6	481,986
Washington <sup>a</sup>	30,302	448,510	1,927,431	36.0	694,577
West Virginia <sup>a</sup>	3,762	52,828	433,258	30.2	130,898
Wisconsin	859,909	183,335	1,043,244	72.7	758,351
Wyoming <sup>a</sup>	796	116,528	117,324	49.2	57,747
<b>Non-federal total</b>	<b>\$ 28,049,889</b>	<b>\$ 13,246,423</b>	<b>\$ 51,847,502</b>	<b>49.1</b>	<b>\$25,467,010</b>
<b>Federal<sup>d</sup></b>			<b>3,270,322</b>	<b>26.2</b>	<b>857,591</b>
<b>Federal employees<sup>e</sup></b>			<b>2,454,861</b>	<b>28.0</b>	<b>686,935</b>
<b>TOTAL</b>			<b>\$55,117,823</b>	<b>47.8</b>	<b>26,324,601</b>

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

a. States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL & HW act or employers liability coverage which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

d. Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

e. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

**Table D4****Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2005 (in thousands)**

State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>c</sup>
Alabama	\$267,482		\$264,518	\$532,000	62.1	\$330,586
Alabama	\$310,780		\$308,738	\$619,518	66.0	\$408,879
Alaska	137,616		45,105	182,721	57.4	104,839
Arizona	157,150	\$311,485	102,235	570,870	65.0	371,029
Arkansas	151,729		75,503	227,232	64.9	147,564
California	5,175,831	2,693,720	2,998,780	10,868,330	44.1	4,789,848
Colorado	269,665	417,025	245,660	932,350	48.8	455,232
Connecticut	538,207		181,767	719,974	41.7	300,317
Delaware	135,834		78,706	214,540	58.9	126,364
District of Columbia	75,718		16,580	92,298	34.6	31,898
Florida	2,433,278		1,040,791	3,474,068	62.3	2,163,793
Georgia	964,581		444,296	1,408,876	50.6	712,754
Hawaii	137,002	32,450	81,327	250,779	39.3	98,665
Idaho	75,254	133,669	33,901	242,823	59.9	145,335
Illinois	1,794,349		624,169	2,418,519	49.5	1,196,702
Indiana	515,490		53,725	569,215	68.5	389,653
Iowa	375,861		111,269	487,130	50.9	248,039
Kansas	262,287		127,279	389,566	57.1	222,556
Kentucky	369,801	76,815	256,135	702,751	55.1	386,987
Louisiana	308,620	163,382	233,252	705,254	51.0	359,638
Maine	106,124	90,670	84,047	280,841	39.8	111,830
Maryland	426,862	216,084	141,467	784,414	40.1	314,383
Massachusetts	773,214		148,744	921,958	36.4	335,182
Michigan	858,953		614,645	1,473,598	34.6	510,063
Minnesota	645,614	65,286	238,494	949,394	48.1	457,076
Mississippi	150,771		139,084	289,855	55.1	159,717
Missouri	547,072	98,293	247,082	892,446	51.7	461,830
Montana	73,280	113,821	40,241	227,342	55.4	125,839
Nebraska	240,396		65,592	305,988	59.8	183,079
Nevada	334,587		122,072	456,660	46.3	211,309

New Hampshire	179,957	48,665	228,623	59.4	135,784
New Jersey	1,373,650	328,458	1,702,109	49.6	843,773
New Mexico	145,183	85,086	259,259	58.1	150,691
New York	1,458,234	952,242	3,378,085	24.1	813,336
North Carolina	1,008,328	373,278	1,381,606	44.7	617,573
North Dakota <sup>a</sup>		0	82,033	55.0	45,085
Ohio <sup>a</sup>	37,693	1,961,918	2,447,038	46.8	1,144,090
Oklahoma	243,852	157,659	638,043	46.9	299,321
Oregon	221,522	71,893	554,586	54.6	302,831
Pennsylvania	1,878,362	591,491	2,741,310	42.9	1,174,705
Rhode Island	31,258	12,961	137,196	34.0	46,587
South Carolina	614,541	238,613	924,734	45.9	424,222
South Dakota	82,871	3,247	86,118	66.3	57,076
Tennessee	663,937	197,990	861,927	54.2	467,300
Texas	934,546	316,327	1,596,879	62.1	991,407
Utah	80,236	42,663	256,802	69.4	178,293
Vermont	106,202	15,826	122,028	48.3	58,918
Virginia	631,073	220,703	851,776	56.5	481,319
Washington <sup>a</sup>		471,865	1,847,523	35.4	654,264
West Virginia <sup>a</sup>	7,051	57,154	765,208	18.4	140,809
Wisconsin	994,634	175,431	1,170,065	78.0	912,296
Wyoming <sup>a</sup>	9	116,528	116,537	48.1	56,094
Non-federal total	\$29,039,067	\$13,709,664	\$53,808,795	47.4	\$25,526,176
Federal <sup>d</sup>			3,258,155	25.6	835,208
Federal employees <sup>e</sup>			2,462,059	27.3	671,056
Total			\$57,066,950	46.2	\$26,361,384

\* Benefits are payments in the calendar year to injured workers and to providers of their medical care.

a. States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL & HW act or employers liability coverage which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

d. Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

e. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

**Table D5**

**Corrected Version of Table 9.B1 of the Annual Statistical Supplement to the Social Security Bulletin:  
Coverage, Benefits, and Costs, selected years 1980-2009**

Year	Estimated number of Workers covered per month (millions)	Type of Insurance			Type of Benefits		Cost of program as a percentage of covered payroll	Benefits as a percentage of covered payroll		
		Private Carriers	State Funds	Federal Funds	Employers Self-Insurance	Medical and Hospitalization			Compensation payments	
1980	87.6	\$13,618	\$7,029	\$1,797	\$2,533	\$2,259	\$3,947	\$9,671	1.76	0.96
1981	87.0	15,054	7,876	2,017	2,578	2,583	4,431	10,623	1.67	0.97
1982	85.6	16,408	8,647	2,191	2,577	2,993	5,058	11,350	1.58	1.04
1983	86.7	17,575	9,265	2,443	2,618	3,249	5,681	11,894	1.50	1.05
1984	91.0	19,686	10,610	2,754	2,651	3,671	6,424	13,262	1.49	1.09
1985	93.7	22,217	12,341	3,059	2,685	4,132	7,498	14,719	1.64	1.17
1986	95.6	24,613	13,827	3,554	2,694	4,538	8,642	15,971	1.79	1.23
1987	98.2	27,317	15,453	4,084	2,698	5,082	9,912	17,405	1.86	1.29
1988	101.4	30,703	17,512	4,687	2,760	5,744	11,507	19,196	1.94	1.34
1989	103.9	34,316	19,918	5,205	2,760	6,433	13,424	20,892	2.04	1.46
1990	105.5	38,237	22,222	5,873	2,893	7,249	15,187	23,050	2.18	1.57
1991	103.7	42,187	24,515	6,713	2,998	7,962	16,832	25,355	2.16	1.65
1992	104.3	44,660	24,030	7,829	3,158	9,643	18,664	25,996	2.13	1.65
1993	106.2	42,925	21,773	8,105	3,189	9,857	18,503	24,422	2.17	1.53



1994	109.4	43,482	21,391	7,398	3,166	11,527	17,194	26,288	2.05	1.47
1995	112.8	42,122	20,106	7,681	3,103	11,232	16,733	25,389	1.83	1.35
1996	114.8	41,960	21,024	8,042	3,066	9,828	16,739	25,221	1.66	1.26
1997	118.1	41,971	21,676	7,157	2,780	10,357	17,397	24,574	1.49	1.17
1998	121.5	43,987	23,579	7,187	2,868	10,354	18,622	25,365	1.38	1.13
1999	124.3	46,313	26,383	7,083	2,862	9,985	20,055	26,258	1.35	1.12
2000	127.1	47,699	26,874	7,388	2,957	10,481	20,933	26,766	1.34	1.06
2001	127.0	50,827	27,905	8,013	3,069	11,839	23,137	27,690	1.43	1.10
2002	125.6	52,297	28,085	9,139	3,154	11,920	24,203	28,094	1.57	1.13
2003	124.7	54,739	28,395	10,442	3,185	12,717	25,733	29,006	1.71	1.16
2004	125.9	56,149	28,632	11,146	3,256	13,115	26,079	30,070	1.70	1.13
2005	128.2	57,067	29,039	11,060	3,258	13,710	26,361	30,706	1.71	1.09
2006	130.3	55,118	28,050	10,551	3,270	13,246	26,325	28,793	1.57	0.99
2007	131.7	55,998	28,736	10,323	3,340	13,599	27,037	28,961	1.46	0.96
2008	130.6	58,104	30,175	10,438	3,424	14,067	29,256	28,848	1.34	0.98
2009	124.9	58,327	30,460	10,118	3,543	14,207	28,940	29,387	1.30	1.03

Source: 1. 1980-1988 data -Sengupta, Reno & Burton (2007)

2. 1989-2010 data - SSA, 2010

# Appendix E: Self-Insurer Benefits Estimates

This report uses a methodology that incorporates historical data to estimate self-insurance benefits in states that were not able to provide recent information.

That methodology is as follows:

**Step A: Calculate the share of payroll that is self-insured (in states where we can).**

- 1) Use NASI estimates of total covered payroll for calendar year 2009. This procedure is outlined in Appendix A.
- 2) Obtain total payroll for workers insured by private carriers and competitive state funds for policy years from NCCI. This information is available for a subset of states (about 39 states), which we call “NCCI states.” (If NCCI payroll for the current year is not available, we use the previous years’ share of NCCI payroll to covered payroll to impute the current year NCCI payroll).
- 3) For each of the NCCI states, use [1] and [2] to estimate the payroll covered by self-insurers. This is given by [1]-[2].
- 4) For the NCCI states, use [1] and [2] to estimate the percent of payroll covered by self-insurers. The percentage of payroll covered by self-insurers is [3] / [1].

(A similar procedure is used for another nine states - California, Delaware, Massachusetts, Michigan, Minnesota, New Jersey, New York, Pennsylvania, and Washington - using payroll data from the Rating Bureaus and Agencies.)

**Step B: Calculate the share of benefits that is self-insured (in states where we can); and**

- 5) Compile state-reported data on self insured benefits where we can.
- 6) Estimate total benefits in states that report self-insured benefits.
- 7) Calculate the share of total benefits that is self-insured in states where we can by dividing self insured benefits by total benefits. [5]/ [6].

**Step C: In states where we have both shares described above, calculate the average relationship between the two shares.**

- 8) For each state where we have a self-insured share of payroll [4] and a self-insured share of benefits [7], calculate the ratio between the two shares. This ratio is [7] / [4].
- 9) Determine the number of states where we have both shares. There were 33 such states in 2009.
- 10) Calculate the average ratio between the two shares for the 33 states. The average ratio in 2009 is 78.9 percent (Table E1). That is, on average, the share of benefits that is self insured is about 78.9 percent of the share of payroll that is self-insured in states where we have both pieces of information.

**Step D: For those states where we have prior years’ data on self-insured benefits, use the latest available year’s self-insured benefits to self-insured payroll ratio to estimate the self-insured benefits for 2009.**

- 11) The self-insurance data has been imputed using previous years’ data in four states where they were available. Use the ratio of self-insured benefit ratio of the state to the total self-insured benefit ratio

$$\text{benefit ratio} = \frac{\text{State Self-Insured Benefits}}{\text{State Total Benefits}} \div \frac{\text{Total available Self-Insured Benefits}}{\text{Total Benefits}}$$

(in available years) to impute the ratio in the later years when data were not available.

**Step E: Use the average relationship between the two shares to estimate the share of benefits that is self-insured in states where we lack that information but have an estimate of the share of payroll that is self insured.**

- 12) For each of the 12 NCCI states and rating bureau states where we lack self-insured benefit data, multiply the percentage of payroll covered by self-insurers [4] by the average ratio in [10].
- 13) The ratio in [12] is used to estimate self-insured benefits in those 12 states. We get the self-insured benefits by multiplying

$$(\text{Private Carrier} + \text{State Fund Benefits}) * \left[ \frac{\text{Ratio in [12]}}{(1 - \text{Ratio in [12]})} \right]$$

## Table E1

### Self-Insurer Estimation Results, 2005–2009

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Average Ratio of the percent of total benefits paid by self-insurers to the percent of payroll covered by self-insurers, (7)/(4)

Year	Ratio
2005	69.8
2006	66.4
2007	66.7
2008	75.4
2009	78.9

**Step F: For states where we lack both ratios described in A and B (above), use the average share of total benefits that is self-insured in the rest of the states.**

For 2009, 33 states reported self-insured benefits. For 12 other states, we imputed self-insured benefits using payroll data. For four states we used prior year's data to estimate self-insured benefit payments in 2009. Two exclusive state fund states – North Dakota and Wyoming – do not allow self insurance.

## Appendix F: Medical Benefit Estimates

Estimates by the National Academy of Social Insurance (NASI) of the percent of total benefits paid that were for medical care are based on reports from state agencies and from estimates provided by the National Council on Compensation Insurance (NCCI). For 2009, we used the NCCI data for the medical share for 37 states.

The National Council on Compensation Insurance (NCCI) is a private organization that assists private carriers, competitive state funds, and insurance commissioners in setting workers' compensation rates in

selected states. NCCI provided NASI estimates of the percent of private carrier benefits paid that were for medical care in 37 states. For eight states we used the agency information on medical share given to NASI by the state agencies. For California, Delaware, New Jersey, New York, and Pennsylvania, we used data on calendar year paid medical benefits data provided by rating bureaus. For Wyoming, neither state reports nor NCCI estimates of medical benefits were available. For that state, the weighted average of the share of total benefits that were for medical care in the other 50 jurisdictions was used.

## Appendix G: Deductible Benefit Estimates

NASI has five methods for estimating deductible benefits and total benefits, depending on what is reported by the state.

### Method A:

State reports deductible amounts.

Method: Use deductible amount reported by state agencies or rating bureaus.

Five States: Delaware, Minnesota, Oregon, Pennsylvania, and South Carolina.

### Method B:

States say deductibles are included in their totals, but do not report amounts of deductibles.

Method: Estimate deductibles by subtracting Net Losses Paid as reported by A.M. Best from state report.

Sixteen states: Alabama, Alaska, California, Hawaii, Maryland, Massachusetts, Michigan, Mississippi, Missouri, Montana, New Jersey, New Mexico, New York, North Dakota, South Dakota, and Virginia.

Note: Before using A.M. Best data, state fund and private carrier data are separated out from both data reported by A.M. Best and state agencies (where necessary, i.e., where A.M. Best or the state agency classify as a private carrier an entity that we classify as a state fund).

### Method C:

Deductibles are not allowed in the state.

Method: Use state reports as totals. Deductibles equal zero.

Five states: Ohio, Washington, West Virginia, Wisconsin, and Wyoming.

### Method D:

State does not report benefit amounts. Deductibles are allowed.

Method: Use Net Losses Paid as reported by A.M. Best and add estimated deductibles, based on the ratio of Manual Equivalent Premiums.

Twenty-five jurisdictions: Arizona, Arkansas, Colorado, Connecticut, the District of Columbia, Florida, Georgia, Idaho, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Nebraska, Nevada, New Hampshire, North Carolina, Oklahoma, Rhode Island, Tennessee, Texas, Utah, and Vermont.

### Method E:

State does not report benefit amounts. Deductibles are allowed. Manual Equivalent Premiums are not available.

Method: Estimate the average ratio of Manual Equivalent Premiums from those states where it is available. Use this average with the Net Losses paid as reported by A.M. Best to impute deductibles.

No state.

## Appendix H: Federal Programs

Various federal programs compensate certain categories of workers for disabilities caused on the job and provide benefits to dependents of workers who die of work-related causes. Each program is described briefly below along with an explanation of whether and how it is included in our national totals of workers' compensation benefits. Our aim in this report is to include in national totals for workers' compensation those federally administered programs that are financed by employers and that are not otherwise included in workers' compensation benefits reported by states, such as the benefits paid under the Federal Employees' Compensation Act. Programs that cover private sector workers and are financed by federal general revenues, such as the Radiation Exposure Compensation Act, are not included in our national totals for workers' compensation benefits and employer costs. More detail on these programs is given below.

**Federal Employees.** The Federal Employees' Compensation Act of 1916 (FECA), which superseded previous workers' compensation laws for federal employees, provided the first comprehensive workers' compensation program for federal civilian employees. In 2009, total benefits were \$2,764 million, of which 31 percent were for medical care. The share of benefits for medical care is lower than in most state programs because federal cash benefits, particularly for higher-wage workers, replace a larger share of pre-injury wages than is the case in most state programs. Administrative costs of the program were \$146 million in calendar year 2009, or 5.3 percent of total benefits (U.S. DOL, 2011). Table H1 reports benefits and administrative costs for federal civilian employees under the Federal Employees' Compensation Act in 1997 through 2009. These benefits to workers and costs to the federal government as employer are included in national totals in this report, and are classified with federal programs.

**Longshore and Harbor Workers.** The Longshore and Harbor Workers' Compensation Act (LHWCA) requires employers to provide workers' compensation protection for longshore, harbor, and other maritime workers. The original program, enacted in 1927, covered maritime employees injured while working over navigable waters because the Supreme Court held that the Constitution prohibits states from

extending coverage to such individuals. The Longshore and Harbor Workers' Compensation Act (LHWCA) is a federal workers' compensation program for maritime employees injured while working over navigable waters, excluding the master or crew of a vessel. It also covers other workers who fall outside the jurisdiction of state programs, such as employees on overseas military bases, those working overseas for private contractors of the United States, and private employees engaged in offshore drilling enterprises.

Private employers cover longshore and harbor workers by purchasing private insurance or self-insuring. In fiscal year 2009, about 530 self-insured employers and insurance companies reported a total of 28,952 lost-time injuries to the federal Office of Workers' Compensation Programs. Total benefits paid under the Act in 2009 were \$1,081 million, which included \$552 million paid by private insurance carriers, \$388 million paid by self-insured employers, \$132 million paid from the federally administered special fund for second injuries and other purposes, and \$10.0 million for the District of Columbia Workers' Compensation Act (DCCA) Fund. Federal direct administrative costs were \$12.9 million or about 1.2 percent of benefits paid (Table H2). The Academy's data series on benefits and costs of workers' compensation includes at least part of the benefits paid by private carriers under the LHWCA in the states where the companies operate. The benefits are not identified separately in the information provided by A.M. Best and state agencies. Benefits paid by private employers who self-insure under the Longshore and Harbor Workers' Compensation Act are not reported by states or A.M. Best. Consequently, these benefits and employer costs are included with federal programs in this report. Table H2 shows benefits reported to the U.S. Department of Labor by insurers and self-insured employers under the Longshore and Harbor Workers' Compensation Act in 1997 through 2009. Ideally, benefits and employer costs under the LHWCA would be counted in the states where the employee is located, because our estimates of covered employment and covered workers count these workers and wages in the states where they work. We believe that at least part of LHWCA benefits paid through private insurance carriers are included in state data that are reported to us by



**Table H1****Federal Employees' Compensation Act, Benefits and Costs, 1997–2009 (in thousands)**

	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total Benefits	\$1,900,779	\$2,009,862	\$1,999,915	\$2,118,859	\$2,223,088	\$2,317,325	\$2,367,757	\$2,445,077	\$2,462,059	\$2,454,861	\$2,586,700	\$2,676,370	\$2,763,885
Compensation Benefits	1,440,867	1,536,430	1,474,168	1,576,354	1,600,031	1,651,947	1,698,273	1,749,397	1,791,003	1,767,926	1,833,958	1,878,331	1,900,156
Medical Benefits	459,912	473,432	525,747	542,505	623,057	665,378	669,484	695,680	671,056	686,935	752,742	798,039	863,729
% Medical	24	24	26	26	28	29	28	28	27	28	29	30	31
Direct Administrative Costs	80,893	80,235	87,425	91,532	109,326	115,226	130,672	131,920	128,536	137,386	143,768	142,532	146,015
Total Costs	1,981,672	2,090,097	2,087,340	2,210,391	2,332,414	2,432,551	2,498,429	2,576,997	2,590,595	2,592,247	2,730,468	2,818,902	2,909,900
Indirect Administrative Costs <sup>a</sup>	6,835	5,750	5,584	6,197	5,056	4,596	4,806	4,587	5,494	7,619	6,773	7,756	7,739

a Includes legal and investigative support from the Office of the Solicitor and the Office of the Inspector General. Funded by General Revenues.

Source: U.S. DOL 2011

**Table H2****Longshore and Harbor Workers' Compensation Act, Benefits, Costs and Number of DBA Death Claims, 1997–2009 (dollars in thousands)**

	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total Benefits	\$617,927	\$642,321	\$659,800	\$671,991	\$689,149	\$700,563	\$716,218	\$747,321	\$795,466	\$879,508	\$923,045	\$983,050	\$1,081,266
Insurance Carriers	219,352	238,464	232,778	249,671	236,726	246,603	262,753	278,887	325,027	367,625	456,773	504,348	551,716
Self-Insured Employers	263,255	261,559	283,991	278,952	307,708	310,940	309,843	322,520	325,694	368,744	325,544	340,336	388,088
LHWCA Special Fund	123,772	129,777	131,152	131,564	133,374	131,684	132,504	135,073	134,230	132,933	130,673	128,372	131,544
DCCA Special Fund	11,548	12,521	11,879	11,804	11,341	11,336	11,118	10,841	10,515	10,206	10,055	9,994	9,918
DBA benefits <sup>a</sup>	N/A	N/A	N/A	8,583	9,411	7,582	11,338	30,079	59,797	115,758	170,231	199,837	242,530
Number of DBA Death Claims	4	1	3	3	5	7	56	231	284	338	426	289	341
Total Annual Assessments	121,300	122,000	141,300	145,700	145,000	136,000	135,800	148,500	146,500	135,500	135,000	132,500	136,500
LHWCA	110,000	111,000	130,000	133,000	133,000	125,000	125,000	137,000	135,000	125,000	125,000	124,000	125,000
DCCA	11,300	11,000	11,300	12,700	12,000	11,000	10,800	11,500	11,500	10,500	10,000	8,500	11,500
Administrative Expenses <sup>b</sup>	9,356	9,821	10,822	11,144	11,713	11,945	12,270	12,510	12,510	12,715	12,725	12,667	12,922
General Revenue	8,378	8,596	8,947	9,373	9,807	9,988	10,297	10,495	10,495	10,691	10,699	10,633	10,855
Trust Fund	978	1,225	1,875	1,771	1,906	1,957	1,973	2,015	2,015	2,024	2,026	2,034	2,067
Indirect Administrative Costs <sup>c</sup>	1,799	2,107	2,247	1,787	2,207	2,514	2,347	2,396	2,019	2,115	2,437	1,856	2,155

<sup>a</sup> Included in Total Benefits. Defense Base Act benefits are paid for injuries or deaths of employees working overseas for companies under contract with the U.S. government.

<sup>b</sup> Longshore program administrative funding is divided between two sources. Industry oversight and claims activities are funded from general tax revenues. The program also exercises fiduciary responsibility for a Special Fund, which draws its revenue primarily from annual industry assessments based on anticipated benefit liabilities. This Fund makes direct benefit payments for certain categories of claims and provides funding for the program's rehabilitation staff and Special Fund oversight activities.

<sup>c</sup> Includes legal and investigative support from the Office of the Solicitor and the Office of the Inspector General. These are not employer costs, but are provided for through general revenue appropriations.

<sup>d</sup> Number of civilian overseas deaths.

Source: U.S. DOL 2011

A.M. Best or the states. At the same time, self-insured employers under the LHWCA are not included in A.M. Best data and are unlikely to be included in state reports; benefits paid from the LHWCA special funds are not included in state data. Thus, for 1997–2009 data, our estimates of total federal benefits include benefits paid by self-insured employers and the special funds under the LHWCA. Unless otherwise specified, we assume that privately insured benefits under the program are included in state reports. Whether and how LHWCA benefits can be reflected in state reports is a subject for analysis.

Total benefits under the Longshore and Harbor Workers' Compensation Act include benefits paid under the Defense Base Act (DBA). Under the DBA, benefits are paid for injuries or deaths of employees (of any nationality) working overseas for companies under contract with the United States government. These benefits are also shown separately in Table H2. Total payments rose from about \$8 million in 2002 to \$243 million in 2009. The number of DBA death claims per year rose from single digits prior to 2003, to 426 in 2007. The increase reflects, in large part, claims and deaths of employees of companies working under contract for the U.S. government in the war zones in Iraq and Afghanistan. Reversing the trend, the number of DBA death claims fell to 289 in 2008. In 2009, DBA death claims rose slightly to 341.

**Coal Miners with Black Lung Disease.** The Black Lung Benefits Act, enacted in 1969, provides compensation for coal miners with pneumoconiosis, or black lung disease, and their survivors. The program has two parts. Part B is financed by federal general revenues, and was administered by the Social Security Administration until 1997 when administration shifted to the U.S. Department of Labor. Part C is paid through the Black Lung Disability Trust Fund, which is financed by coal-mine operators through a federal excise tax on coal that is mined and sold in the United States. In this report, only the Part C benefits that are financed by employers are included in national totals of workers' compensation benefits and employer costs in 1997–2009. Total benefits in 2009 were \$481 million, of which \$232 million was paid under Part B and \$249 million was paid under Part C. Part C benefits include \$31 million for medical care. Medical benefits are available only to Part C beneficiaries and only for diagnosis

and treatment of black lung disease. Medical benefits are a small share of black lung benefits because many of the recipients of benefits are deceased coal miners' dependents, whose medical care is not covered by the program. Federal direct administrative costs were \$37.5 million or about 7.8 percent of benefit payments. Table H3 shows benefits under the Black Lung Benefit program in 1997 through 2009 for both parts of the program. Its benefits are paid directly by the responsible mine operator or insurer, from the federal Black Lung Disability Trust Fund, or from federal general revenue funds. No data are available on the experience of employers who self-insure under the Black Lung program. Any such benefits and costs are not reflected in Table H3 and are not included in national estimates.

**Energy Employees.** The Energy Employees Occupational Illness Compensation Program Act (EEOICPA) provides lump-sum payments up to \$150,000 to civilian workers (and/or their survivors) who became ill as a result of exposure to radiation, beryllium, or silica in the production or testing of nuclear weapons and other materials. This is Part B of the program, which went into effect in July 2001. It provides smaller lump-sum payments to individuals previously found eligible for an award under the Radiation Exposure Compensation Act. Medical benefits are awarded for the treatment of covered conditions. Total benefits in 2009 were \$472 million, of which \$338 million were paid as compensation benefits (U.S. DOL, 2011). The EEOICPA originally included a Part D program that required the Department of Energy (DOE) to establish a system for contractor employees and eligible survivors to seek DOE assistance in obtaining state workers' compensation benefits for work-related exposure to toxic substances at a DOE facility. In October 2004 Congress abolished Part D, creating a new Part E program to be administered by the Department of Labor. Part E provides benefit payments up to \$250,000 for DOE contractor employees, eligible survivors of such employees, and uranium miners, millers, and ore transporters. Wage-loss, medical, and survivor benefits are also provided under certain conditions. Total Part E benefits in 2009 were \$396 million. Benefits under both Part B and Part E are financed by general revenues and are not included in our national totals. Table H4 provides information on both Part B and Part E of the EEOICPA, as amended.

**Table H3****Black Lung Benefits Act, Benefits and Costs, 1997–2009**  
(in thousands)

	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total Benefits	\$1,095,585	\$1,000,383	\$982,787	\$927,973	\$866,069	\$821,678	\$775,098	\$719,065	\$665,844	\$616,039	\$569,300	\$524,645	\$481,172
Part C Compensation	388,656	373,707	360,470	346,903	332,620	316,585	303,724	289,699	276,413	262,026	248,375	231,261	217,685
Part C Medical Benefits	92,041	80,450	74,776	69,322	61,136	65,756	59,739	52,992	49,244	41,552	38,545	37,492	31,485
Part B Compensation	614,888	546,226	547,541	511,748	472,313	439,337	411,635	376,374	340,187	312,461	282,380	255,892	232,002
Total Direct Administrative Costs	25,759	31,030	33,246	32,866	34,657	36,123	37,393	38,057	37,917	38,453	38,749	38,009	37,502
Part C (DOL)	25,759	26,698	29,023	28,591	29,897	31,488	31,991	32,157	32,724	33,182	33,374	32,648	32,411
Part B (SSA)	*	4,332	4,223	4,275	4,760	4,635	5,402	5,900	5,193	5,271	5,375	5,361	5,091
Trust Fund Advances from U.S. Treasury <sup>a</sup>	370,000	360,000	402,000	490,000	505,000	465,000	525,000	497,000	446,000	445,000	426,000	426,000	0
Interest Payments on Past Advances	470,635	494,726	515,016	541,117	567,814	595,589	620,582	650,579	674,894	694,964	717,214	739,469	341,939
Coal Tax Revenues Received by the Black Lung Trust Fund	635,342	634,270	569,704	512,799	511,520	588,000	480,080	577,575	620,420	598,520	650,432	646,800	652,935
Indirect Administrative Costs <sup>b</sup>	19,903	20,115	20,882	21,348	22,207	23,050	23,459	23,914	24,424	25,242	26,020	25,473	25,528

\* information not available

<sup>a</sup> Under the Emergency Economic Stabilization Act of 2008 (EESA), total Trust Fund debt (cumulative advances) at the end of 2008 was converted to coupon bonds that are repayable to the U.S. Treasury on an annual basis.<sup>b</sup> 1997–2008 are interest payments on Trust Fund borrowing from the U.S. Treasury. Starting in 2009, the amount shown is the repayment of bond principal and interest on principal debt as required by the Trust Fund debt restructuring portion of the EESA

Source: U.S. DOL 2011

**Workers Exposed to Radiation.** The Radiation Exposure Compensation Act of 1990 provides lump-sum compensation payments to individuals who contracted certain cancers and other serious diseases as a result of exposure to radiation released during above ground nuclear weapons tests or during employment in underground uranium mines. The lump-sum payments are specified in law and range from \$50,000 to \$100,000. From the beginning of the program through May 2011, 23,931 claims were paid for a total of \$1,587 million, or roughly \$66,336 a claim (U.S. DOJ, 2011). The program is financed with federal general revenues and is not included in national totals in this report. Table H5 shows cumulative payments under the Radiation Exposure Compensation Act since its enactment in 1990.

**Veterans of Military Service.** U.S. military personnel are covered by the federal veterans' compensation program of the Department of Veterans Affairs,

which provides cash benefits to veterans who sustained total or partial disabilities while on active duty. In the fiscal year 2009, 3.1 million veterans were receiving monthly compensation payments for service-connected disabilities. Of these, 52 percent of the veterans had a disability rating of 30 percent or less, while the others had higher-rated disabilities. Total monthly payments for the disabled veterans and their dependents were \$2.8 billion in 2009, or about \$34.1 billion on an annual basis (U.S. Department of Veterans Affairs, 2010). Veterans' compensation is not included in our national estimates of workers' compensation.

Table H6 provides information on the Veterans' Compensation program. This program is somewhat similar to workers' compensation in that it is financed by the employer (the federal government) and compensates for injuries or illness caused on the job (the armed forces). It is different from other workers' compensation programs in many respects.

**Table H4**

**Energy Employees Occupational Illness Compensation Program Act, Part B and Part E Benefits and Costs, 2001-2009 (in thousands)**

	2001	2002	2003	2004	2005	2006	2007	2008	2009
Total Benefits Part B	\$67,341	\$369,173	\$303,981	\$275,727	\$392,503	\$502,636	\$561,824	\$605,338	\$471,639
Compensation Benefits	67,330	363,671	288,274	250,123	358,751	460,494	490,089	517,383	337,642
Medical Benefits <sup>a</sup>	11	5,502	15,707	25,604	33,752	42,142	71,735	87,955	133,997
Direct Administrative Costs <sup>b</sup>	30,189	69,020	65,941	94,158	106,818	104,872	107,417	92,075	51,377
Total Benefits Part E <sup>c</sup>	n/a	n/a	n/a	n/a	268,635	270,598	409,100	468,982	395,680
Compensation Benefits	n/a	n/a	n/a	n/a	268,586	269,558	407,277	465,742	390,077
Medical Benefits <sup>d</sup>	n/a	n/a	n/a	n/a	49	1,040	1,823	3,240	5,603
Direct Administrative Costs <sup>b</sup>	n/a	n/a	n/a	n/a	39,295	55,088	61,671	59,152	68,146

a Medical payments made for claimants eligible under Part B only and claimants eligible under both Part B and Part E.

b Part B costs for 2002-08 include funding for the Department of Health and Human Services/National Institute for Occupational Safety and Health's (DHHS/NIOSH) conduct of dose reconstructions and Special Exposure Cohort determinations. For 2002, these costs were \$32.7 million; 2003, \$26.8 million; 2004, \$51.7 million; 2005, \$50.5 million; 2006, \$58.6 million; 2007, \$55.0 million, and 2008, \$41.5 million. Beginning in 2009, these costs are a direct appropriation to DHHS/NIOSH. Part E costs for 2005-09 include funding for an Ombudsman position. For 2005, these costs were \$0.3 million; 2006, \$0.6 million; 2007, \$0.8 million; 2008, \$0.8 million; and 2009 \$0.7 million.

c The Energy Part E benefit program was established in October 2004.

d Medical payments made for claimants eligible under Part E only.

Source: U.S. DOL 2011

**Table H5****Radiation Exposure Compensation Act,  
Benefits Paid as of May 12, 2011  
(benefits in thousands)**

Claim Type	Claims	Benefits
Downwinder	15,206	\$760,270
Onsite Participant	1,576	113,035
Uranium Miner	5,471	546,375
Uranium Miller	1,393	139,300
Ore Transporter	285	28,500
<b>TOTAL</b>	<b>23,931</b>	<b>\$1,587,480</b>

Source: U.S. DOJ 2011

With cash benefits of about \$34.1 billion in 2009, veterans' compensation is about 116 percent of the size of total cash benefits in other workers' compensation programs, which were \$29.4 billion in 2009. Because it is large and qualitatively different from other programs, veterans' compensation benefits are

not included in national totals to measure trends in regular workers' compensation programs.

**Railroad Employees and Merchant Seamen.**

Finally, federal laws specify employee benefits for railroad workers involved in interstate commerce and merchant seamen. The benefits are not workers' compensation benefits and are not included in our national totals. Instead, these programs provide health insurance and short-term and long-term cash benefits for ill or injured workers whether or not their conditions are work-related. Under federal laws, these workers also retain the right to bring tort suits against their employers for negligence in the case of work-related injuries or illness (Williams and Barth, 1973).

This report includes in national totals for workers' compensation those federal programs that are financed by employers and that are not otherwise included in workers' compensation benefits reported by states in 1997 through 2009. The accompanying tables provide detailed information on federally administered programs, including some that are not included in national totals in this report.

**Table H6****Federal Veterans' Compensation Program, Compensation Paid in Fiscal Year 2009  
(benefits in thousands)**

Class of Dependent	Number	Monthly Value
Veteran Recipients - total	3,069,652	\$2,841,913
Veterans less than 30 percent disabled (no dependency benefit)	1,606,485	359,899
Veterans 30 percent or more disabled	1,463,167	2,482,014

Source: U.S. Department of Veterans Affairs 2011.



# Appendix I: Workers' Compensation under State Laws

Table I illustrates the benefit parameters which form the basis for the data estimated in this report. The table is taken from the IAIABC (International Association of Industrial Accident Board and Commissions) and WCRI (Workers Compensation Research Institute) joint publication of *Workers' Compensation Laws* (IAIABC-WCRI, 2011). The state laws are as of January 2010.

The benefit parameters defined in this table portray the workers' compensation differences across states. The difference may lie in (a) when the first day of disability begins; (b) compensation that is included in determining the "wage"; (c) periods over which the average wage is calculated; (d) caps on wages earned by the injured worker; or in (e) differences in calculation of compensation rate, etc.

For each state the table describes:

- The waiting period before a worker receives benefits.
- The maximum benefit payments and length of benefit payments for Temporary Total Disability.
- The weekly payments and benefit limitations for Permanent Total Disability.
- The maximum weekly benefit and benefit limitations for Permanent Partial Disability.
- The maximum weekly benefit and benefit limitations for Death Benefits.

**Table I**

**Workers' Compensation State Laws as of January 2010**

State	Waiting Period, Jan 10		Temporary Total Disability, Jan 10		Permanent Total Disability, Jan 10			Permanent Partial Disability, Jan 10		Death Benefits, Jan 10		
	Waiting Period before a worker can receive Indemnity benefits	Retroactive period	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly PPD Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
Alabama	3 days	21 days	\$729.00	Duration of TTD disability	66 2/3% PIWW	\$729.00	No	No	\$220.00	300	\$729.00	500 weeks
Alaska	3 days	More than 28 days	\$1,033.00	Continue until employee is medically stable or released to work	80% of the workers spendable after tax or NWW	Depends upon year of injury. Maximum PTD benefit would be the maximum TTD benefit in the year of injury	If found to no longer be permanently and totally disabled	Up to the maximum TTD weekly rate.	\$901 if paid weekly	No unscheduled PPD	\$939.00	12 years
Arizona	7 days	14 days	\$577.41	Duration of TTD disability	66 2/3% AMW	\$597.40	No	No	\$672.04	Payable for life unless rearranged by Industrial Commission	\$461.60	None
Arkansas	7 days	14 days	\$562.00	450	66 2/3% PIWW	\$562.00	Benefits are for the length of disability and may be paid for life <sup>8</sup>	There is a limitation of the weekly amount but not on the total amount	\$422.00	450 maximum for all disability <sup>P</sup>	\$562.00	450 week limit for partial dependents <sup>1</sup>
California	3 days	21 days	\$986.69	104a	66 2/3% AWW to a maximum	The maximum is dependent on the impairment rating. PD, \$345 up to 69.75 D then \$405 at 70 PD	There is a set number of weeks for each separate disability	No	\$345 and \$405	not applicable	\$986.69	When paid in full
Colorado	3 days	14 calendar days	\$807.24	Duration of TTD disability	66 2/3% PIWW	\$807.42	Benefits are for the length of disability and may be paid for life	None	\$254.06 is set weekly rate for all scheduled injuries; \$807.24 weekly is maximum for calculating unscheduled injuries	400 <sup>1</sup>	\$807.42	18-21 if dependent is in school, remarriage of a spouse, or death of a dependent

Connecticut	3 days	7 calendar days	\$1,138.00	Duration of TTD disability	75% of spendable earnings	\$1,138.00	None	None	\$922.00	520	\$1,138.00	None	
Delaware	3 days	7 calendar days	\$610.67	unlimited	66 2/3% AWW up to the maximum at the date permanent impairment becomes fixed	\$610.67	No	No	\$610.67	300	\$610.67	When spouse remarries or if minor dependents reach 18 years of age or 25 if attending accredited higher learning institution	
District of Columbia	3 days	14 days	\$1,288.00	500 weeks for all disability benefits with ability to petition for an additional 167 weeks	66 2/3% PIWW	\$1,288.00	500 weeks for all disability benefits with ability to petition for an additional 167 weeks	The first \$75,000 in benefits for death or PTD shall be paid by the employer/insurer. Amounts over \$75,000 are paid from death and PTD Trust Fund	\$1,288.00	500 week	\$1,288.00		
Florida	7 days	22 days	\$772.00	104	66 2/3% PIWW	\$772.00	Benefits are payable to age 75. If the injury occurred after age 70, benefits are payable during continuance of PTD not to exceed 5 years following determination of PTD	No	\$772.00	2 weeks for each % of impairment from 1-10%; 3 weeks from 11-15%; 4 weeks from 16-20%; and 6 weeks for each rating over 21%		\$772.00	Maximum payable is \$150,000
Georgia	7 days	21 days	\$500.00	400 weeks unless catastrophic injury	not applicable	not applicable	not applicable	not applicable	\$500.00	300	\$500.00	\$150,000 for surviving spouse with no dependents	
Hawaii	3 days	None	\$745.00	Duration of TTD disability	66 2/3% PIWW	\$745.00	No	No	\$745.00	312	\$745.00	312 weeks	

# Table I continued

## Workers' Compensation State Laws as of January 2010

State	Waiting Period, Jan 10		Temporary Total Disability, Jan 10		Permanent Total Disability, Jan 10			Permanent Partial Disability, Jan 10		Death Benefits, Jan 10		
	Waiting Period before a worker can receive Indemnity benefits	Retrospective period	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
Idaho	5 days	TTD exceeds 2 weeks	\$578.70	None. TTD continues while in the period of recovery.	67% of AWW	\$578.70	No	Weekly rate may change after the first 52 weeks of TTD and each year thereafter on January 1 based on the increase in the ASWW	55% of the ASWW at the time of injury	500	60% of current avg. state wage or \$385.80 wkly-2010	500 weeks for spouse
Illinois	3 days	14 calendar days	\$1,243.00	Duration of TTD disability	66 2/3% AWW	\$1,243.00	No	No	664.72	500	\$1,243.00	\$500,000 or 25 years
Indiana	7 days	21 days	\$650.00	500	66 2/3% PIWW	\$650.00	500 weeks	Yes	not applicable	100% or 500	\$650.00	500 weeks
Iowa	3 days	14 days	\$1,413.00	Benefits are for length of disability and maybe paid for life	80% of the worker's spendable after tax or NWW	\$1,413.00	No	No	\$1,300.00	500	\$1,413.00	None
Kansas	7 days	21 days	\$546.00	225 to 415 weeks depending on type of injury-also maybe a limitation of \$100,000 or \$125,000 for all indemnity benefits depending on types of benefit paid.	66 2/3% AWW	\$546.00	Benefits are for the length of disability and may be paid for life or until maximum of \$125,000 is reached.	Yes	\$546.00	415 weeks but the first 15 weeks does not count toward this maximum	\$546.00	\$250,000
Kentucky	7 days	14 calendar days	\$711.79	Duration of disability or until receipt of Social Security old age and survivor benefits	66 2/3% PIWW	\$711.79	No	100% SAWW for injury year	\$533.84	425 weeks if rating is 50% or less; 520 wks if rating is over 50%	335.01 for spouse; 402.01 for spouse and child	18/22 if in school
Louisiana	1 week	6 weeks	\$522.00	Duration of TTD disability	66 2/3% PIWW	\$522.00	Benefits are for the length of disability and may be paid for life	None	\$478.00	520	\$522.00	No

Maine	7 days	14 calendar days	\$616.74	416 weeks	80% of the worker's spendable after tax or NWW	\$616.17	Benefits are for the length of disability and may be paid for life	No	\$616.74	520 weeks for the duration of the disability if PI rating is greater than a threshold of approximately 12.5%	\$596.42	500 weeks or until age 18 for children
Maryland	3 days	14 days	\$920.00	Duration of TTD disability	66 2/3% PIWW	\$920.00	No	\$45k except that benefit shall be paid for the period that the covered employee is permanently totally disabled	\$690.00	None	\$920.00	Partial dependency benefits may not exceed \$60,000
Massachusetts	5 days	21 days	\$1,094.70	156	66 2/3% PIWW	\$1,094.70	No	No	\$1,094.70	not applicable	\$1,000.00	None
Michigan	7 days	14 calendar days	\$746.00	Duration of TTD disability	80% of the worker's spendable after tax or NWW	\$739.00	800 weeks conclusive payment with factual determination thereafter	None	not applicable	not applicable	\$739.00	500 weeks
Minnesota	3 days	10 days	\$850.00	130	66 2/3% PIWW	850.00	No	No	\$850.00	No	\$850.00	Benefits ends after 10 years or 10 years after the last child is no longer dependent, minimum payable is \$60,000
Mississippi	5 days	14 days	\$422.31	450	66 2/3% PIWW	\$422.31	450 weeks or until total compensation paid equals \$190,039.50	\$190,039.50	\$422.31	450	\$422.31	450 weeks; remarriage for spouse; age 18-23 for child
Missouri	3 days	14 days	\$807.48	400	66 2/3% PIWW	\$807.48	No	None	\$422.97	400	\$807.48	m
Montana	32 hours or 4 days, whichever is less	None	\$626.00	Duration of TTD disability	66 2/3% PIWW	\$626.00	Payable until retirement	None	\$313.00	375	\$626.00	500 weeks
Nebraska	7 days	6 weeks TTD disability	\$691.00	Duration of TTD disability	66 2/3% PIWW	\$691.00	Payable for the length of disability and may be for life	None	\$691.00	300	\$691.00	None
Nevada	5 days	5 consecutive days or 5 cumulative days within a 20 day period	\$798.49	Duration of TTD disability	66 2/3% pre-injury AMW	\$798.79	No	Per maximum consumption limit and formula	\$798.49	PPD benefits paid for 5 years or to age 70, whichever is later	\$798.49	For a child at 18 or 22 if a full-time student

**Table I continued**

**Workers' Compensation State Laws as of January 2010**

State	Waiting Period, Jan 10		Temporary Total Disability, Jan 10		Permanent Total Disability, Jan 10			Permanent Partial Disability, Jan 10		Death Benefits, Jan 10		
	Waiting Period before a worker can receive Indemnity benefits	Retroactive period	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly PPD Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
New Hampshire	3 days	14 days	\$1,287.00	Duration of total disability	60 % PIWW	\$1,287.00	Payable for the length of disability and may be for life	None	\$1,287.00	350 weeks for a whole person award	\$1,287.00	18 or 25 if a full-time student
New Jersey	7 days	7 calendar days	\$742.00	400	70% of actual wage at the time of injury	\$742.00	Payable for the length of disability and may be for life	None	\$742.00	600	\$711.00	
New Mexico	7 days	4 weeks	\$666.02	700	66 2/3% PIWW	\$666.02	Payable for the length of disability and may be for life	None	\$666.02	500 weeks if the rating is less than 80%, 700 weeks if rating is greater	\$666.02	100% of the SAWW for 700 weeks
New York	7 days	More than 14 days	\$600.00	Duration of TTD disability	66 2/3% PIWW	\$600.00	No. Benefits are payable for the length of disability which is almost always for life of the claimant	The maximum the injured worker can receive is 2/3 of the worker's AWW at the time of the injury up to the weekly maximum benefit in place at the time of injury	\$600.00	Not if date of accident or disability is before March 13, 2007; 525 weeks if date of accident or disability is on or after march 13, 2007	\$600.00	n
North Carolina	7 days	21 days	\$834.00	Duration of TTD disability	66 2/3% PIWW	\$834.00	Payable for the length of disability and may be for life	None	\$834 for scheduled injuries	300	\$834.00	400 weeks <sup>o</sup>
North Dakota	5 days	5 days	\$832.00	104	66 2/3% PIWW	\$832.00	Payable until retirement at which time benefits may switch to ABP <sup>r</sup> .	No	PPI rate multiplied by the maximum body impairment percentage of 100%. Paid as lump sum	100% impairment based on lump sum payment	\$832.00	\$300,000 or death
Ohio	7 days	14 calendar days	SWAWW or 775.00	as long as disability lasts	72% PIWW <sup>e</sup>	\$775.00	No	No	\$258.33	200	\$775.00	None



Oklahoma	3 days	Waiting period is not paid	\$717.00	300	70% PIWW	\$717.00	Payable for the length of disability and may be for life	No	\$359.00	500	\$717.00	when dependency ends
Oregon	3 days	14 days	\$1,064.80	n/a	66 2/3% PIWW	\$800.60	No	Maximum weekly \$800.60	not applicable	Oregon has no scheduled or unscheduled benefits but the theoretical maximum payment for PPD would be \$302,945.73	\$1,054.00	None
Pennsylvania	7 days	14 calendar days	\$845.00	Duration of TTD disability subject to conversion to partial benefits at 104 weeks <sup>b</sup>	not applicable <sup>9</sup>	not applicable	not applicable	not applicable	\$836.00	not applicable	\$845.00	n/a
Rhode Island	3 days	None	\$882 plus an additional \$15 for each dependent up to 80% of workers' AWW	Duration of TTD disability	75% of worker's spendable or after tax or NWW	\$882 plus an additional \$15 up to each dependent up to 80% of the workers' net wage	Payable for the length of disability and may be for life	None	\$90.00	500	\$882 plus \$40 per child not to exceed 80% of AWW	None
South Carolina	7 days	More than 14 days	\$689.71	Duration of TTD disability with a maximum of 500 weeks	66 2/3% PIWW	100% of SAWW	500 weeks	500 weeks	Depends on scheduled body part	340	\$689.71	500 weeks
South Dakota	7 days	7 calendar days	\$620.00	Duration of TTD disability	66 2/3% PIWW <sup>f</sup>	\$620.00	For length of disability and can be for life	None	\$620.00	312	\$620.00	None
Tennessee	7 days	14 days	\$837.00	Duration of TTD for physical injuries; 105 weeks for psychological injuries	66 2/3% PIWW	\$761.00	Until Social Security eligibility age or 260 weeks where the date of injury is on or after age 60	No	\$761.00	400	\$761.00	None
Texas	7 days	2 weeks	\$773.00	105c	75% AWW	\$773.00	No	No	\$541.00	300	\$773.00	Minimum of 364 weeks
Utah	3 days	14 calendar days	\$720.00	312	66 2/3% PIWW	\$612.00	PTD status may be reexamined by submitting employee to reasonable medical evaluations; rehabilitation and retraining efforts; disclosure of Federal Income Tax returns	No	\$480.00	312	\$612.00	312 weeks of combined benefits excluding PTD

## Table I continued

### Workers' Compensation State Laws as of January 2010

State	Waiting Period, Jan 10		Temporary Total Disability, Jan 10		Permanent Total Disability, Jan 10			Permanent Partial Disability, Jan 10		Death Benefits, Jan 10		
	Waiting Period before a worker can receive Indemnity benefits	Retroactive period	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Disability Benefits	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
Vermont	3 days	10 days	\$1,092.00	Duration of TTD disability; insurer must review after 2 years	66 2/3% PIWW	\$1,092.00	For duration of total disability- can be for life	No	405 weeks for non-spinal; 550 weeks spinal	\$1,092.00	Varies with dependent	Varies with dependent
Virginia	7 days	3 weeks	\$895.00	500	66 2/3% PIWW	\$895.00	Can be lifetime	Applicable comp. rate	None	\$895.00	500 weeks	500 weeks
Washington	3 days	14 calendar days	\$1,101.33	Duration of TTD disability	Depends on the option chosen by employee	\$1,043.49	For length of disability and can be for life	There is a maximum payment for lump sums only, up to \$8,500	None	\$1,101.00	18th birthday or 23rd birthday when enrolled in school, or disabled	18th birthday or 23rd birthday when enrolled in school, or disabled
West Virginia	3 days	7 consecutive days	\$676.61	104	66 2/3% PIWW	\$676.61	Payable until age 70	No	None	\$676.61	Death or remarriage of widow, majority of children	Death or remarriage of widow, majority of children
Wisconsin	3 days	7 non-consecutive days	\$815.00	Duration of TTD disability	66 2/3% PIWW	\$815.00	For length of disability and can be for life	No	1,000	\$282.00	\$815.00	\$244,500
Wyoming	3 days	8 days	\$815.00	24 months	66 2/3% actual monthly wage unless they earn less than 73% of the SWAMW and then it is 92% of their actual monthly wages	\$543.33	No	No	None	None	Benefits paid monthly	None

a. There are some limited exceptions where benefits can be paid for 240 weeks.

b. Disability under PA laws means loss of earning power. PA law allows employer/insurer to request "Impairment Rating Examination" after employee has received 104 weeks of full benefit payments. If IRE shows less than 50% impairment based on AMA Guides then benefits are reclassified as partial disability compensation and are subject to a 500-week cap.

c. An exception to this amount could be made when an extension of MMI based on spinal surgery is approved by the Division.

- d For purposes of this table, "catastrophic injury" means any injury which is one of the following: (1) Spinal cord injury involving severe paralysis of an arm, a hand, a foot, or a leg involving the effective loss of use of that appendage; (3) Severe brain or closed head injury as evidenced by ;(A) Severe sensory or motor disturbance; (B) Severe communication Disturbance; (C) Severe complex integrated disturbances of cerebral function; (D) Severe episodic neurological disorders; or (F) Other conditions at least as severe in nature as any condition provided in subparagraphs (A) through (E) of this paragraph; (4) Second or third degree burns over 25 percent of the body as a whole or third degree burns to 5 percent or more of the face and hands; (5) Total or industrial blindness; (6) Any other injury of a nature and severity that prevents an employee from being able to perform his or her prior work and any work available in substantial numbers within the national economy for which such employee is otherwise qualified, provided, however, that the injury has not already been accepted as a catastrophic injury by the employer and the authorized treating physician has released the employee to return.
- e 72% of the workers' pre-injury weekly wage for the first 12 weeks and then 66.67% thereafter.
- f If the weekly wage is below 50% of the SAWW the calculation is wages, less income tax and social security.
- g TTD ceases during the time period an employee refuses a suitable job offer
- h All earned income of the injured worker and all employment based retirement income is considered in the calculation of extended benefits.
- i KS has a cap of \$125,000 for Permanent Total and that cap includes any TTD paid.
- j Total TTD and PPD for scheduled and unscheduled cannot be greater than \$75,000 if the impairment rating is less than 25% and \$150,000 if more than 25%.
- k Workers' Compensation benefit provisions apply to injury dates on and after July 1, 2008 to distinguish them from the benefit levels applicable to most of the calendar year payments shown through the report.
- l If total amount of weekly compensation is less than \$7.00 per week.
- m Dependency benefits end at various times depending on level of dependency. Spouse- lifetime or until remarriage. Children-until they meet the age threshold. For cases that fall in the Schoemehl window (Jan 9, 2007- Jun 26, 2008), surviving dependents can claim benefits from SIF instead of deceased employee.
- n Benefits end for spouse on remarriage or upon death and end for children upon turning 18, or if still in school, 23, if not blind or physically disabled. If blind or physically disabled then the benefits end when the blindness or physical disability ends, after age 18 or 23 as appropriate. If benefits paid to dependent parents or grandparents, they end upon death. For brothers, sisters or grandchildren at age 18, or, if in school, 23.
- o Widower may receive lifetime payments if she is totally disabled at the date of decedent's death and child will receive weekly payments for 400 weeks or until age 18, whichever is longer.
- p Except for PTD which is payable for life
- q Wage Loss benefits may continue for life, however
- r ABP benefits are additional benefits payable. ABP are payable for the length of the disability or until death. Benefit is based on the duration of disability prior to retirement.

PIWW Pre-injury Weekly wage

AWW Average weekly wage

NWW Net weekly wage

SAWW State-wide average weekly wage

AMW Average Monthly wage

Source: IAIABC-WCRI (2010)



## Appendix J: Second Injury Funds and Guaranty Funds

Second injury funds help reduce the financial impact of a workers' compensation claim in the event a worker with a disability is injured on the job, aggravating pre-existing impairment. Thirty-nine states provided the details of their second injury fund. Details are given in Table J1.

As stated by the annual report of the National Conference of Insurance Guaranty Funds, "The purpose of state guaranty associations is to provide a mechanism for the prompt payment of covered claims of an insolvent insurer, as those terms are defined and limited by guaranty association statutes, so that catastrophic financial loss to certain claimants and policyholders may be avoided." Guaranty Funds

cover the outstanding claims of insolvent insurance companies, the property and casualty guaranty fund system. It is a measure of protection to policyholders, beneficiaries and their families who otherwise would experience lengthy delays getting resolution of their claim, usually receiving only a fraction of the amount due from the insurer (NCIGF, 2009). The self-insurance guaranty Funds help pay the covered workers' compensation claims of insolvent self-insurers.

There were 24 insurance guaranty funds and 12 self-insurance guaranty funds who responded to NASI's Annual Survey 2009. Table J2 and J3 show the totals of these guaranty funds.

**Table J1****Second Injury Fund Paid Benefits for the Calendar Years 2005-2009**

States	2005	2006	2007	2008	2009
Alabama	n.a	n.a	n.a	n.a	n.a
Alaska	\$3,077,376	\$2,899,258	\$2,816,244	\$4,105,087	\$2,895,447
Arizona	14,987,418	12,930,595	14,767,509	16,471,784	14,722,208
Arkansas	4,476,335	5,449,794	7,691,254	5,617,056	6,332,163
California	40,920,944	45,349,992	48,231,184	43,767,260	50,385,638
Colorado	8,687,027	9,519,611	8,504,329	8,227,347	7,243,689
Connecticut	37,385,612	37,460,632	35,037,646	39,707,328	39,406,068
Delaware	5,376,976	5,735,647	5,886,482	5,789,453	6,586,590
D.C.	n.a	n.a	n.a	n.a	n.a
Florida	214,350,000	253,850,000	203,300,000	87,050,000	53,950,000
Georgia	112,332,534	145,165,702	144,036,385	146,692,209	152,070,929
Hawaii	15,765,723	18,805,177	18,243,489	15,820,705	14,429,936
Idaho	2,327,953	2,542,723	2,654,181	3,840,977	4,004,091
Illinois	1,177,667	1,465,583	1,891,143	1,176,683	1,533,421
Indiana	3,450,365	3,679,309	4,078,372	3,940,959	4,988,757
Iowa	1,809,044	1,862,078	3,049,366	2,464,790	2,781,612
Kansas	3,992,459	3,499,162	4,262,638	4,262,638	3,761,176
Kentucky	74,721,835	72,177,061	70,409,622	69,050,217	67,672,436
Louisiana	48,206,127	38,540,285	41,549,518	42,181,211	38,419,534
Maine	n.a	n.a	n.a	n.a	n.a
Maryland	19,928,913	16,715,724	18,171,918	17,921,321	14,515,454
Massachusetts	18,539,957	26,575,339	20,725,671	24,078,327	26,575,359
Michigan	22,657,719	16,221,899	16,253,722	14,472,512	12,890,804
Minnesota	64,178,760	58,914,988	58,621,823	60,759,405	59,459,582
Missouri	93,405	110,860	119,113	104,549	139,608
Mississippi	60,960,007	63,806,940	67,829,414	69,641,680	53,958,704
Montana	1,208,296	1,315,806	1,436,696	2,337,885	1,318,321
Nebraska	1,750,853	1,716,525	1,668,203	1,608,600	1,587,537
Nevada	1,782,825	1,970,002	2,658,723		975,412
New Hampshire	12,146,443	8,602,597	7,429,544	15,297,755	12,939,306
New Jersey	144,100,000	150,700,000	163,700,000	164,300,000	170,800,000
New Mexico	2,473,629	2,248,676	1,917,052	1,673,734	1,436,868
New York	n.a	n.a	n.a	n.a	n.a
North Carolina	n.a	n.a	n.a	n.a	n.a
North Dakota	n.a	n.a	n.a	n.a	n.a
Ohio	n.a	n.a	n.a	n.a	n.a
Oklahoma	19,928,913	16,715,724	18,171,918	17,921,321	16,607,569
Oregon	714,773	692,761	677,858	366,617	1,280,332
Pennsylvania	252,610	246,000	264,001	686,663	3,331,704
Rhode Island	2,540,658	2,828,762	2,617,824	2,673,172	
South Carolina	147,638,624	118,252,779	113,231,699	113,715,933	103,088,646
South Dakota	n.a	n.a	n.a	n.a	n.a
Tennessee	9,717,607	9,920,262	10,465,012	9,073,098	7,280,862
Texas	456,388	437,223	508,015	687,863	671,557
Utah	22,009,500	21,167,000	20,567,500	19,822,500	20,125,540
Vermont	n.a	n.a	n.a	n.a	n.a
Virginia	n.a	n.a	n.a	n.a	n.a
Washington	169,000	129,000	68,000	129,000	148,000
West Virginia	111,654,401	10,733,505	11,703,611	12,029,809	11,302,657
Wisconsin	15,913,087	12,859,116	16,040,676	15,776,766	12,985,070
Wyoming	n.a	n.a	n.a	n.a	n.a

'n.a.' - Data not Available.

Source: National Academy of Social Insurance



**Table J2****Guaranty Funds Paid Benefits for the Calendar Years 2005-2009**

States	2005	2006	2007	2008	2009
Alabama	\$10,546,425	\$9,572,585	\$8,270,504	\$8,513,545	\$8,706,158
Alaska	6,190,940	4,470,911	4,205,913	3,935,517	4,023,847
Arizona	n.a	n.a	n.a	n.a	n.a
Arkansas	2,938,871	1,531,295	652,295	1,097,658	454,130
California	428,048,226	337,091,556	209,400,799	156,705,011	170,726,414
Colorado	5,969,263	3,227,391	3,373,239	3,646,926	3,125,893
Connecticut	11,589,220	10,829,391	5,538,972	3,603,128	2,625,067
Delaware	n.a	n.a	n.a	n.a	n.a
D.C.	2,125,051	1,587,080	1,819,706	1,532,145	1,084,108
Florida	n.a	n.a	n.a	n.a	n.a
Georgia	26,989,297	19,745,819	13,782,366	11,226,202	13,900,950
Hawaii	n.a	n.a	n.a	n.a	n.a
Idaho	1,720,918	1,498,268	1,023,995	855,490	637,599
Illinois	n.a	n.a	n.a	n.a	n.a
Indiana	2,373,093	1,569,131	891,088	644,601	277,470
Iowa	3,020,599	1,742,250	1,194,142	267,083	486,656
Kansas	4,971,144	6,893,585	2,897,293	1,799,028	2,613,097
Kentucky	6,523,069	5,588,375	6,081,979	5,681,362	4,736,238
Louisiana	16,259,937	10,330,558	7,555,638	8,227,881	8,198,745
Maine	8,723,487	5,402,822	4,191,887	1,666,328	1,503,977
Maryland	n.a	n.a	n.a	n.a	n.a
Massachusetts	14,904,917	20,740,002	17,975,951	12,703,619	6,544,432
Michigan	4,103,352	3,804,561	3,313,650	2,305,280	1,866,002
Minnesota	14,057,879	11,360,818	11,631,274	11,021,858	11,021,858
Mississippi	n.a	n.a	n.a	n.a	n.a
Missouri	n.a	n.a	n.a	n.a	n.a
Montana	2,244,336	2,265,252	2,088,419	1,884,250	2,053,517
Nebraska	n.a	n.a	n.a	n.a	n.a
Nevada	n.a	n.a	486,432	n.a	n.a
New Hampshire	n.a	n.a	n.a	n.a	n.a
New Jersey	25,873,836	20,593,567	19,614,131	19,238,455	15,363,783
New Mexico	n.a	n.a	n.a	n.a	1,568,850
New York	n.a	n.a	n.a	n.a	n.a
North Carolina	n.a	n.a	n.a	n.a	n.a
North Dakota	n.a	n.a	n.a	n.a	n.a
Ohio	n.a	n.a	n.a	n.a	n.a
Oklahoma	n.a	n.a	n.a	n.a	n.a
Oregon	3,388,192	2,021,477	1,488,741	1,212,721	1,888,961
Pennsylvania	58,779,553	66,296,225	49,748,320	43,321,285	30,175,472
Rhode Island	n.a	n.a	n.a	n.a	n.a
South Carolina	7,542,483	4,761,463	1,487,946	2,405,431	2,212,245
South Dakota	n.a	n.a	n.a	n.a	n.a
Tennessee	n.a	n.a	n.a	n.a	n.a
Texas	26,983,023	24,695,064	16,374,589	22,909,602	21,716,395
Utah	2,683,105	2,490,352	2,079,691	2,233,595	8,757,746
Vermont	n.a	n.a	n.a	n.a	n.a
Virginia	n.a	n.a	n.a	n.a	n.a
Washington	n.a	n.a	n.a	n.a	n.a
West Virginia	65,492	n.a	n.a	n.a	n.a
Wisconsin	9,354	n.a	n.a	n.a	n.a
Wyoming	10,140	12,916	13,862	145,288	69,539

'n.a.' - Data not Available.

Source: National Academy of Social Insurance

**Table J3****Self-Insured Guaranty Funds Paid Benefits for the Calendar Years 2005-2009**

States	2005	2006	2007	2008	2009
Alabama	n.a	n.a	n.a	n.a	n.a
Alaska	n.a	n.a	n.a	n.a	n.a
Arizona	n.a	n.a	n.a	n.a	n.a
Arkansas	\$21,180,215	\$21,741,454	\$21,908,430	\$23,652,461	\$23,030,910
California	6,363,249	6,161,362	6,273,986	6,812,932	10,430,029
Colorado	n.a	n.a	n.a	n.a	n.a
Connecticut	n.a	n.a	n.a	n.a	n.a
Delaware	2,179,098	1,685,729	1,332,112	1,274,199	1,068,010
D.C.	n.a	n.a	n.a	n.a	n.a
Florida	8,174,379	6,737,318	4,889,869	4,683,973	2,015,747
Georgia	291,709	367,042	273,285	186,321	2,588,973
Hawaii	n.a	n.a	n.a	n.a	n.a
Idaho	n.a	n.a	n.a	n.a	n.a
Illinois	n.a	n.a	n.a	n.a	n.a
Indiana	n.a	n.a	n.a	n.a	n.a
Iowa	n.a	n.a	n.a	n.a	n.a
Kansas	n.a	n.a	n.a	n.a	n.a
Kentucky	n.a	n.a	n.a	n.a	n.a
Louisiana	n.a	n.a	n.a	n.a	n.a
Maine	n.a	n.a	n.a	n.a	n.a
Maryland	n.a	n.a	n.a	n.a	n.a
Massachusetts	n.a	n.a	n.a	n.a	n.a
Michigan	n.a	6,370,513	6,429,764	4,994,060	5,110,379
Minnesota	5,233,862	4,762,500	4,132,056	4,054,642	3,988,100
Mississippi	n.a	n.a	n.a	n.a	n.a
Missouri	1,019,063	1,164,989	709,346	758,560	453,234
Montana	n.a	n.a	n.a	n.a	n.a
Nebraska	n.a	n.a	n.a	n.a	n.a
Nevada	n.a	n.a	163,816	478,442	n.a
New Hampshire	n.a	n.a	n.a	n.a	n.a
New Jersey	100,000	100,000	900,000	1,700,000	n.a
New Mexico	n.a	n.a	n.a	n.a	n.a
New York	n.a	n.a	n.a	n.a	n.a
North Carolina	n.a	n.a	n.a	n.a	n.a
North Dakota	-	-	-	-	-
Ohio	n.a	n.a	n.a	n.a	n.a
Oklahoma	n.a	n.a	n.a	n.a	n.a
Oregon	409,123	350,939	364,630	371,074	352,926
Pennsylvania	4,631,698	7,876,377	6,223,622	4,497,895	1,449,583
Rhode Island	n.a	n.a	n.a	n.a	n.a
South Carolina	n.a	n.a	n.a	n.a	n.a
South Dakota	n.a	n.a	n.a	n.a	n.a
Tennessee	n.a	n.a	n.a	n.a	n.a
Texas	n.a	n.a	n.a	n.a	n.a
Utah	n.a	n.a	n.a	n.a	n.a
Vermont	n.a	n.a	n.a	n.a	n.a
Virginia	n.a	n.a	n.a	n.a	n.a
Washington	1,030,000	787,000	1,078,000	977,000	1,675,000
West Virginia	n.a	77,683	77,321	54,572	74,598
Wisconsin	n.a	n.a	n.a	n.a	n.a
Wyoming	-	-	-	-	-

'n.a.' - Data not Available. North Dakota and Wyoming do not allow self-insurance in their state.

Source: National Academy of Social Insurance

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August 2011

